The Best Way to Stay Healthy

Stay As Far Away From Doctors As You Can!

The New Combined Edition
Updated and Unabridged

Volume I:
The Mediterranean Hunter-Gatherer Diet

Volume II:

Healing Body, Mind and Spirit

George Steele MD

First Edition March 2007

NOTICE

This book is a source of information for improving your health but, for more serious conditions, it cannot serve as replacement for the services of a licensed health care professional.

If you suspect you have a medical problem, you should not only seek competent medical advice, you should educate yourself about the nature of your illness and treatments. Any application of the material set forth in the following pages is at the reader's discretion and sole responsibility.

To

Ed Lowe, my mentor in life

Mom and Dad, thanks!

Jack, the 6th grader, who was and is an inspiration to us all

About the Author:

George Steele MD is an Internal Medicine physician. His interests include exploring the impact of nutrition and our emotional state on health and wellbeing. He spends most of his time taking care of his patients and creating educational handouts for his patients. His goal is for his patients to heal themselves. He will assist by pointing them in the right direction and encouraging them to continue the course. Healing must come from within each of us, and we do this best in community. He has written this book to share these ideas with the community beyond those with whom he can participate directly.

Over the past 20 years, Dr. Steele has also been on the faculty at the University of North Carolina, Brown University, Duke University, the Medical College of Pennsylvania, and the University of Pennsylvania. He is married to Katherine High MD and they have three (wonderful) children.

A Note from the Author:

Thank you for purchasing this book. My hope is you will find some helpful tools for living life. This is the combined Volumes 1 and 2, which are directed at healing; healing our body, mind and spirit. My suggestion is to try to implement many or most of the changes presented in Volume 1: the Mediterranean Hunter-Gatherer diet (summarized in the Staying Healthy Handout in Appendix 1). If you are eating well and continue to feel less-than-terrific, then it may be time to look at Volume 2. It is important to seek the help of your physician if you are not improving as you may have already developed a significant health problem. But my hope for all of us is that we will continue to be healthy in body, mind and spirit for as long as we desire.

If you would like to purchase additional copies of The Best Way to Stay Healthy , visit

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George Steele MD

VOLUME 1
THE MEDITERRANEAN HUNTER-GATHERER DIET

VOLUME 2

HEALING BODY, MIND AND SPIRIT

Part 1: Healing

Part 2: When You Need to See Your Doctor

Never visit a doctor
until you are one hundred years old

An old Russian proverb

PREFACE TO VOLUME 1

Staying healthy requires us to do each of the following:

First, understand our bodies.

Then, understand what causes our aging.

We need to change some of the foods we are eating (avoiding the foods of famine) and understand why we must do this to be and stay healthy.

We also need to examine our attitudes and learn to accept ourselves as we are so we may live a positive life with power rather than a negative destructive life.

And finally, we will explore interventions to alleviate problems we have already developed.

1 Understand Your Body

The foundation of our health is our genetic inheritance, but nutrition, toxins, infections, accidents, and finally, our attitude have a significant effect on how our genetic predisposition is manifest. During my nineteen years as an Internal Medicine physician and educator, it has become clear to me that modifying our environment and the foods we eat is the best way to stay healthy.

Your Lifestyle Accounts for 75% of Your Risk of Disease and Death

Environment and nutrition are much more important in determining our health than our genetic inheritance, appearing to account for 75 percent of disease occurrence while genetics accounts for 25 percent.[1] This book will try to optimize the 75 percent of this risk that is modifiable. While we may not be masters of our fate, we can at least give ourselves the best odds and feel great while we are doing it! This is the best way to stay healthy.

2 Understand Your Aging (Chapter 2)

This book approaches aging as postponing the inevitable (and staying healthy in the meantime). The question is asked, what causes us to age? And then again, aging starts in our twenties, followed by more questions and answers (see glossary on page 21):

Why do our joints ache?

Why do we wrinkle?

How does insulin promote disease and early death?

[1] Verkasalo PK, Kaprio J, Koskenvuo M, Pukkala E. Int J Cancer 1999 Dec 10;83(6):743-749 Genetic predisposition, environment and cancer incidence: a nationwide twin study in Finland, 1976-1995.

What are superoxide radicals and how do they cause disease?

What is apoptosis?

What is glycation?

We will answer each of these questions, and more, in terms of the inevitability of aging and how to best stay healthy in the meantime.

3 Avoid the Food of Famine (Chapters 3 through 6)

As you understand the significant adverse effects caused by consuming sugars, starches and certain fats, your motivation for eating changes. Instead of eating to meet our cravings, we choose foods that make us feel strong, clear-headed and positive. Most people who reach that point will never sink back to eating the foods of famine (better known as junk food or better yet, dog food filler).

The Seven-Day Plan of Nutrition for Women (Men, you will eat 50% more; as if that is fair!) is designed to keep our bodies running smoothly for most of the potential 130 years of life. It is also grain-free and avoids the proteins and sugars from dairy, which can be associated with adverse reactions in many people.

If we truly understand that how we feel today (and the rate of our aging) is directly related to the food we eat – we find it easier to *just say no* to the morning bagel (this book calls it *Bagel Death*). If we also understand that if we feel terrific right now, we are much more likely to feel terrific in five to ten years. If we feel lousy now, imagine how we might feel in five to ten years. Now is the time to feel great. Now is the time to slow aging, so let's do it!

4 The Mediterranean Hunter-Gatherer Diet (Chapters 7 & 8)

This book explains which foods are in, which are out and why. The specifics of the Mediterranean diet are explored, beginning with a Seven-Day Plan of Nutrition for Women. This plan presents a strategy for implementing changes in your eating habits to reduce insulin resistance and thereby reduce your risks for heart disease, diabetes, cancer, depression, and early death (with numerous options-including slow-suicide options for days you get up on the wrong side of the bed). You will find recipes to get you started for breakfast, lunch, dinner, dessert and snacks. There are complete weekly menus and recipes accompanied by nutritional breakdowns (fat, protein, carbohydrates, fiber, omega-3 oils and cholesterol) for each dish, and shopping guides. Men can carry out this same plan by simply eating 50% more of the same foods (this may not seem fair but who said life was meant to be fair?)

5 The Mediterranean Hunter-Gatherer diet versus the Atkins', Ornish and Protein Power (Chapter 9)

The Atkins' diet has been shown to reduce all heart disease risk factors but the saturated fat may promote shrinking of your brain (small vessel disease in the brain). But the ketosis in the very-low-carbohydrate diets (Atkins', Mediterranean Hunter-Gatherer, and Neanderthin) may actually reduce aging. The other low carbohydrate diets (as opposed to very-low-carbohydrate diet) including Protein Power, South Beach, Sugar Busters, The Zone, etc. do not allow ketosis and therefore may not be as helpful in reducing aging.

6 Nutritional Supplements can be Helpful or Harmful (Chapter 10)

A few supplements can actually reduce your risk of diabetes, heart disease, cancer and arthritis (chromium, fish oils, and MSM-methylsulfonylmethane). Others may actually increase diabetes (glucosamine) or high blood pressure (St. John's Wort) or cancer (possibly Saw Palmetto?) or heart disease (taking Vitamin E capsules showed a trend toward worsening heart disease). So I encourage patients to eat a healthy and varied diet with the good oils and lots of nuts, green vegetables, eggs, fish and lean meats and poultry.

7 Ultimate Sports Nutrition (Chapter 11)

Burning fat as fuel allows you to exercise longer and harder while consuming less oxygen (hence less breathing required) and thereby less oxidative stress (aging). Sugar requires more oxygen to burn and may actually harm tissues as you exercise.

8 Asthma And Allergies Can Be Optional (Chapter 12)

This book looks at the causes and treatment of allergies. Milk makes more mucus, so if you are congested avoid milk, cheese, yogurt, ice cream, and pizza. Other foods that can contribute to congestion include the sulfites in wine and vinegar, orange juice and other citrus, chocolate, soy, peanuts, and wheat. All of these foods appear to stimulate the immune system in an adverse way promoting an over-reaction to environmental allergens. Avoiding these foods can greatly reduce symptoms of allergic rhinitis, chronic sinusitis and asthma, and is often much easier than avoiding dust, mold, mildew, animal dander and pollens.

9 Eating Wheat Promotes Certain Illnesses (Chapter 13)

The protein in wheat (gluten) irritates the lining of the intestines in many people and may worsen inflammatory bowel disease (Ulcerative colitis and Crohn's disease), allergies and asthma, as well as Celiac Sprue and Irritable Bowel Syndrome.

10 Alcohol: the Two-Edged Sword (Chapter 14)

A little alcohol is better than none-at-all and a lot better than too much (more than 9 drinks per week for women and 14 drinks per week for men) in reducing heart disease and cardiac death. But the risks of drinking may outweigh the benefits so be careful and drink moderately if at all.

But Does This Actually Work?

In the last two weeks I have had two obese patients return to see me after four months on the Mediterranean Hunter-Gatherer diet. Each had recently developed diabetes with a hemoglobin A1c (test of diabetes control) over 13mg% (a tremendously high level). In four months, the first fellow had lost 50 pounds and five inches while the second lost 60 pounds and six inches (albeit from a 44 to a 38). And both had healed their diabetes (their A1c levels are now normal).

But many patients do not succeed. They seem to be held back by some unknown force (perhaps a negative attitude?). The purpose of the second volume of this book is for people not succeeding in meeting their goals of health and purpose in life. First is *Volume I: Staying Healthy* that contains important nutritional information for all of us. For those of us who continue to struggle despite having studied Volume I, *Volume II: Healing* will provide more tools and suggestions to move us toward greater health.

PREFACE TO VOLUME 2

Staying healthy requires us to do each of the following:

First, understand our bodies

Then, understand what causes our aging

We need to change some of the foods we are eating (avoid the foods of famine) and understand why we must do this to be and stay healthy

We also need to examine our attitudes and learn to accept ourselves as we are so we may live a positive life with power rather than a negative destructive life

And finally, we can incorporate needed interventions to alleviate problems we have already developed

In Volume 1 we explored aging and how a large waist predicts health problems such as diabetes, cancer and heart disease. Then we discussed how in starving yourself (dieting) you lose muscle as well as fat (but you don't want to lose muscle), while if you reduce calories by eliminating sugar and starch you actually gain muscle and lose only fat.

The Mediterranean Hunter-Gatherer diet was presented as one way to become lean and healthy again. This diet is rich in the healthy oils including fish oils, nut oils, olive oil and grapeseed oil as well as others. It also encourages eating whole foods and lots of green leafy vegetables as well as meat, fish and poultry and some nuts and berries.

Whereas Volume 1 focused on creating a healthy body, the essence of Volume 2 is to encourage us to accept ourselves as already healed. In that act can we begin to actually heal our mind, body and spirit. Fear and guilt harm our bodies. The Trappist monks referred to fear and guilt as the 8th and 9th deadly sins, producing separation of each of us from God, our communities, and even ourselves.

1 Examine Your Attitudes (Chapters 15 & 16)

The premise of this book is that most of us fail to stay healthy not because of lack of knowledge but from a negative attitude. It is clear that hostility is highly associated with heart disease[2] as is depression with early death.[3] This book provides tools to help us understand who we are and what we can do to stay healthy.

Attitude is the key. But how do we overcome a negative attitude? Fear can lead to anger; guilt can lead to depression. Only by letting go of our fears and guilt can we begin healing. It is not enough to know what to eat and how to exercise. We must love ourselves enough to put good food into our bodies and lead healthy and active lives.

[2] Williams RB. A 69-Year-Old Man with Anger and Angina. JAMA 1999, 282:763-770.
[3] Wulsin LR. Does Depression Kill? Arch Intern Med 2000, 160:1731-2.

2 Incorporate Interventions to Get Rid of Specific Diseases (Chapter 17)

These include the common cold, diabetes, hypertension, high cholesterol, arthritis, congestive heart failure, and depression. This book makes clear how an optimal diet and positive attitude can both supply the basic needs of the body and fortify the body's defenses and mechanisms of healing to stay healthy.

(a) *Breast, Prostate, Colon, And Lung Cancer*

Insulin and sugar accelerate the growth of prostate cancer (as well as colon, breast and pancreatic cancer). This book explains how one of the most effective treatments for advanced prostate cancer is a low-sugar/low-calorie diet. Changing your lifestyle can reduce breast cancer recurrence by a factor of eight while keeping you healthful and hopeful.

(b) *Arthritis and other problems when our bodies attack themselves*

Why do our bodies attack and destroy our joints? This does not make sense. Something in our environment turns on our immune systems and then turns our immune systems against our joints. Infections such as Lyme Disease and Parvovirus B-19 do this. But it is also true that certain foods contain proteins (lectins and others) that stimulate the immune system to destroy our joints. Avoiding corn, certain other grains and the nightshade vegetables (eggplant, potatoes, peppers and tomatoes) may help some of us avoid or reduce arthritis.

Are your ankles and feet sore when you first get up in the morning? Do you have to hold the railing to walk down the stairs? There is a supplement called MSM (which is similar to glucosamine but appears to be better at reducing pain) which can alleviate most of these symptoms. Insuring adequate dietary sulfur appears to be key to having healthy connective tissue (shown in studies of supplementation with glucosamine and methylsulfonylmethane -MSM).

(c) *Chronic Fatigue Syndrome*

Chronic fatigue syndrome is a good example of what can go awry when our mind and body react to our environment in an adverse way. We will look at both conventional as well as integrative medicine treatment and explain the rationale behind each.

(d) *Iron Storage Disease Can Be Suppressed By Regular Blood Donations*

Iron storage disease (hemachromatosis) is the most commonly inherited disease, which promotes heart failure, diabetes, and liver disease. Most people consume excess iron. However, if you donate blood regularly and have your ferritin checked (a blood test), the manifestations of this disease can usually be avoided.

(e) *Obesity*

Increased waist circumference (over 30 inches in women and 35 inches in men) is associated with increased insulin resistance which can lead to diabetes, heart disease, cancer and depression (and early death in worms and rats). The very-low-carbohydrate diet lowers insulin levels and has been successful in many patients in reducing their waist circumference and its attendant risks.

(f) *Accidents*

Perhaps you have heard it stated that there are no accidents. We become distracted by issues of life and ignore the world (and people) around us. If we focus on the needs of others and ourselves (especially while driving- instead of the cell phone or the radio), we will find we can hear the future in many situations and thereby avoid accidents.

3 Diabetes Can Be Made To Go Away! (Chapter 18)

The goal of this book is not to treat diabetes but to get rid of it (you really don't need it). Many people with Type 2 diabetes can resolve their hyperglycemia (high blood sugar) by eating the Mediterranean Hunter-Gatherer diet; patients with juvenile diabetes (Type 1) can also benefit. The interventions in this book also prevent diabetes from developing in the first place in people at increased risk. This includes those people with a waist circumference greater than 33 inches in men (28 inches in women) measured at the point of your stomach that enters the room first (usually near the belly button).

4 Hypertension and High Cholesterol are often A Lifestyle Issue (Chapter 19)

Hypertension is often a lifestyle issue, not a lack of the right medication. In some people it is stress, or foods containing allergens (particularly wheat and alcoholic beverages), or the lack of appropriate exercise. Meditation, exercise, changing the foods you eat, and forgiveness of yourself and others (letting go of anger and resentment) can have a major impact on your blood pressure.

Elevated LDL cholesterol is most frequently associated with elevated fat stores and elevated insulin levels and greatly reduced by changing these underlying risk factors through changes in eating habits. In the one out of twenty patients with genetically high cholesterol, there are specific recommendations on how to diagnose and treat. If your LDL-cholesterol is very high or if you have diabetes, you will need to limit or avoid egg yolks, shrimp, lobster and fatty meats. For those people with normal cholesterol levels, eggs with runny yolks appear to promote health.

5 Depression Is A Chemical Imbalance (Chapter 20)

Depression is a chemical imbalance that can be improved by antidepressants, chromium picolinate, avoidance of sugar and starch, eating a very-low-carbohydrate (ketogenic) diet, and forgiveness of yourself and others. If you can avoid the antidepressants by doing the other interventions, your sex life will undoubtedly be better.

6 Sex and Spirituality (Chapter 22)

My favorite section is entitled Searching for an Effective Spiritual Placebo (section 6 in Chapter 22), which explores the three kinds of devotion, recognizing our suffering, the three doors of Hell, psychic masochism, and the stages of life. There is a little poetry (by yours truly) and a few stories as well.

7 The Appendices

These provide the specific tools for healing discussed in the chapters listed above. Included are the Emotional Freedom Technique (EFT), Relaxation with mental imagery, Relaxation with the autogenic (affecting your nervous system) technique and a summary of the Enneagram: the nine ways of responding to stress.

What is the Absolute Minimum I Recommend?

Some of you do not want to spend any more time than absolutely necessary to accomplish feeling better and living longer and healthier. The minimum I suggest is as follows. Remember that eating sugar is death!

Eat green leafy vegetables, olive oil, tree nuts (like almonds, walnuts, pecans, Brazil nuts and cashews), fish/eggs/poultry/meat, berries and alcohol (if you drink alcohol) in about that order. If you are not trying to lose weight, you may add some non-citrus low-sugar fruits, oats, black beans, lentils and maybe a little rice (if you are starving but only if you do not have heartburn).

Avoid all wheat products (bread, pasta, pizza, etc.), processed fruit juices, and limit or avoid most sugar and starches (elevated insulin and blood sugar greatly promote heart disease and cancer).

Milk makes more mucus in most of us, so if you or your family have allergies or asthma, avoid the protein (casein) in milk, cheese, yogurt, ice cream, and pizza.

Eat fatty fish (herring, sardines, or salmon) three times per week (better than Coral Calcium!) (Or you may take the mint or lemon flavored Cod liver oil).

Take calcium citrate 500-1,000mg with vitamin D 400-800 units per day. If you take the Cod liver oil, do not take extra vitamin D. Take magnesium citrate 250-500mg (helps bones and the heart) and chromium polynicotinate 200mcg once daily (older rodents given chromium behave like younger rodents. Can you imagine what that might mean?).

Take MSM 3,000-4,000 mg once in the morning if you are not drinking rainwater and eating living things (MSM relieves the aches and pains of getting older, not to mention reducing wrinkles and keeping your hair and nails healthy).

Exercise regularly (Take the stairs, empty the dishwasher, take out the trash, and then take the dog for a walk- a complete physical fitness program).

Have a significant person or pet (a dog is good; a partner is better but unfortunately it appears that taking on a husband may shorten your life but perhaps some would consider it worth the trouble?).

Practice forgiveness, of yourself and others (particularly your spouse).

Avoid too much media exposure (TV, radio, newspapers, magazines, the Internet, and the local gossip); it may distract you from who you are and what you can do with and for the people around you.

Wear a hat in the sun to protect your eyes (reduces cataracts and macular degeneration).

Wear your seatbelt (and turn off the cell-phone and radio so you can listen to the world around you).

Do not try to make others happy, but share your happiness with others (make yourself happy in life today).

These suggestions are designed to keep you healthy. If you are not feeling better after trying these lifestyle modifications, please go back to your doctor, as you may need more evaluation and treatment for problems that have already developed.

Glossary of Important Terms

Apoptosis (A-pop-**toe**-sis): my absolute favorite word, which means our bodies are designed to die at a certain time, i.e. 130 years of age (programmed cell death, or pop goes the cell). Our cells live only so long and then die. This can happen sooner if you develop diabetes or a large waist (more than 35 inches in women, 40 inches in men). You want to delay apoptosis for as long you can. Get your waist smaller and avoid sugar, starch and cigarettes.

Atherosclerosis (Aa-ther-o-skler-**o**-sis): this is hardening of your arteries leading to heart attack and stroke (to be avoided if possible). Keep your waist small (below 35 inches for men and below 30 inches for women) and your LDL cholesterol below 100 mg%.

Autoimmune (auto-im-**you**-n): this is your body attacking itself, which is a bad thing. Try to avoid foods and infections that stimulate our bodies to over-react to normal situations (more about this in the allergy section of the book).

Carbon monoxide: cigarette smoking causes wrinkles due to the carbon monoxide in the cigarette smoke; wrinkles of your face as well as your heart muscle, your kidneys, and your blood vessels (meaning you are aging). Don't smoke, or if you do, smoke Lucky Strike non-filters (lower in carbon monoxide). But you know those must be bad for you!

Celiac disease (See-lee-**ak**): the protein in wheat flour causes the immune system to destroy the lining of the small intestine in approximately 1% of the US population. It increases the risk of small bowel cancer by fifty times, as well as reducing absorption of important nutrients. We do not need to eat wheat flour (unless we are crossing the desert).

Crohn's disease (Krone's): another disease in which the immune system attacks the intestines. No cause is known but many patients improve if they avoid grains, dairy and yeast (see Chapter 13).

Diabetes (Die-a-**bee**-tees): this term means to urinate too much (in this case due to too much sugar in the blood). Most patients with diabetes have type 2 diabetes, due to eating too much sugar and starch causing their waist to grow too much (more than 35 inches in women, more than 40 inches in men are high-risk measurements). Avoid the sugars and starches and lose the waist.

Gene (Jeen): the DNA or chromosomes that carrying the code for who we are going to be. But we can mess this code up by living too wild (smoking, eating excess sugar, etc.).

Glucose (**Glue**-kos): the sugar in your food and in your blood.

Glycation (Gly-**kay**-shun): this is where sugar acts like glue making all of our tissues stiff and old. This is seen in patients with diabetes or people with a large waist and elevated blood sugars. Avoid the starches and slow aging.

Glycemic (Gly-**seem**-ik) Index: a measure of how much a food with raise your blood sugar and insulin level (and thereby increase stiffness, aging and the growth of tumors).

Insulin (**In**-sue-lynn): the hormone that tries to keep our blood sugars in a narrow range (not too little and not too much). But eating excess sugar and starch leads to higher insulin levels which increases weight gain, diabetes, heart disease and cancer.

Ketosis (Key-**toe**-sis): when you are burning fat your body make ketones for fuel. You can measure if you are burning fat by seeing if there are ketones in your urine (using the Ketostix, see Chapter 11). In ketosis you lose only fat and actually gain muscle).

Mitochondria (My-toe-**kon**-dree-a): the part of the cell that creates chemical energy to allow the cell to function and repair itself. If the mitochondria are damaged (by oxidative stress or the burning of too much sugar), then the cell cannot repair itself and will die before it's time.

Oxidation (Ox-i-**day**-shun): excess oxygen being used by the cell, which leads to damage to structures in the cell and eventually can lead to premature cell death.

Dr. Steele is on the faculty of the University of Pennsylvania School of Medicine in the Division of General Internal Medicine. His previous appointments have included faculty positions at Duke University, Brown University, the University of North Carolina, and the Medical College of Pennsylvania (previously the Women's Medical College of Philadelphia). His areas of interest are the impact of nutrition on health and metabolism, as well as the impact of attitude and emotions on health and well being. His next project is finishing Volume II of this set, which will focus on healing of the mind, body and spirit (all of which comes from within, of course).

First, Do No Harm

Hippocrates

1

STAYING HEALTHY

1 The Best Way To Stay Healthy Is To Stay As Far Away From Doctors As You Can

First, Do No Harm

The Hippocratic Oath states this clearly and overtly.
It says nothing about making patients better. Yet we often risk harm to do good.

My interpretation of the Hippocratic oath is as follows:

Impart knowledge
Instill hope

(Then check to be sure that the patient understands because people get confused)
(And before proceeding, don't forget to make sure nothing is already wrong!)

Physicians:
(We can all be physicians and healers)

A healing attitude is the key to success
Eat the *Mediterranean Hunter-Gatherer Diet*
Find some exercise you like and do it
Wear a hat and don't get sunburned!
Wear comfortable shoes
(Eat sardines?)

Physician, heal thyself!

If you feel better when you do this, then suggest others do the same!

Promises I make to myself

I am healing
I put good things into my body
I have money to give away
I have love to give away
I try to be present in every minute of every day

(a) ***The Meaning of Illness***

Our symptoms and diseases are our bodies telling us something is out of whack. Sometimes it is a subtle message, like tightness in our neck and shoulders, or aching in a joint. Other times it is the warning shot across the bow of our ship of life when we develop depression, diabetes, heart disease, or cancer. This warning indicates that a major life change is mandatory. If we listen to our bodies, we will hear what is *off* and be able to address it. Often the problem arises from something we are putting into our body, or from something we are not putting into our body (we are what we eat). At times it may be related to our approach to life.

I believe in healing. I believe if people understand how their lifestyle affects their body and how they feel (now), they will make better choices- especially if they have better choices- nuts, good fruits and vegetables, moderate alcohol consumption, and Starbucks' Decaf.

I also believe in aging. I see it every day in myself, in my family, and in my patients. Occasionally I can even see into the future. This occurs when I see patients who remind me of someone who has not done well. They are choosing a path that is a slippery slope to early death.

Yet it can seem so simple. Your face reflects the health of your whole body. Is your face looking older? Then your body is aging also. If your skin is getting stiff, wrinkled, and non-pliable, then the same process is occurring in your blood vessels, your heart muscles, and your joints. They are getting stiff, wrinkled, and non-pliable.

(b) *What Causes These Wrinkles and Other Abnormalities of Our Skin and Internal Organs?*

- ***Insulin resistance*:** insulin acts as a growth factor promoting the growth of fat cells, tumor cells,[4] and atherosclerosis[5] (cholesterol plaques in your blood vessels). This growth promotes early death through such diseases as diabetes, heart disease, stroke, and cancers of the prostate, breast, colon, and pancreas.

- ***Glycation:*** much of the stiffness of our tissues originates from the excess sugar in our system acting as a molecular glue sticking proteins together making them stiff and yellow.[6] The most obvious place to see this is in the wrinkles on our faces. This can also be appreciated in the stiffness of our joints as we age. The same process is occurring in the lenses of our eyes resulting in our arms needing to get longer and our glasses slipping to the end of our noses. What is harder to appreciate is that our blood vessels and our heart are also getting stiff and old.

- ***Carbon monoxide (and other toxins) and oxidative stress:*** we once thought that the major adverse effect of carbon monoxide was to reduce the ability of the blood to carry oxygen. Recent work at Duke University has revealed that even low levels of carbon monoxide poison the metabolism of the cells of our body and greatly increase oxidative stress by blocking pathways that reduce super-oxide radicals. This promotes aging of our skin (wrinkles), aging of our brain (dementia), and aging of our lungs (emphysema and lung cancer). So stop smoking already!

- ***Autoimmune phenomenon:*** This is where our bodies are attacking themselves. Our puffy faces, our aching joints, and our irritable intestines often signify more than we give them credit. Inflammation underlies most serious illness, yet we ignore many symptoms that signify that our immune systems are turned on in an unhealthy way.

We are starting a journey to understanding our own aging and how to optimize it. So how do you feel today? Like it or not, this accurately predicts your long-term outcomes. If you're looking and feeling great today, chances are in five years and ten years you will also feel great. But if you are not feeling well today, just imagine how bad you will feel in five years. Now is the time to change course.

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[4] Hilf R, Livingston JN, Crofton DH. Effects of diabetes and sex steroid hormones on insulin receptor tyrosine kinase activity in R3230AC mammary adenocarcinomas. *Cancer Res* 1988 Jul 1;48(13):3742-50.

[5] O'Keefe JH, Miles JM, Harris WH, Moe RM, McCallister BD. Improving the adversecardiovascular prognosis of Type 2 diabetes. *Mayo Clin Proc* 1999;74:171-180.

[6] Viassara H. Advanced glycosylation in diabetic nephropathy and aging. *Adv Nephrol Necker Hosp* 1996;25:303.

If you go to five doctors, you will get five opinions (and they may all be wrong!). You must find your own solutions that make sense to you. I spend much of my time with sick people trying to figure out what works and what doesn't.

(c) ***A Few Rules That May Help:***

- First do no harm (don't do anything too risky)
- Don't go to a doctor who smokes
- Don't go to a doctor who is overweight
- Don't go to a doctor who is chronically stressed
- Don't go to a doctor who is truly unhappy

> ***A good doctor is better than a bad doctor***
>
> ***and almost as good as no doctor at all***
>
> **Anonymous**

An unhealthy doctor can not be a healer. Physician, heal thyself-first! If they can't even do that, they have no business in the business of the practice of medicine. In 1997, I came to the realization that I had been harming patients telling them to eat the American Heart Association diet!

Dear Father O'Hara:

How do I convince thee that potatoes promote aging and that bread is the staff of death?

We are all physicians; we are all healers. We are all able to find a path to healing, first for ourselves, and then by example we can help those around us. But not until we begin to solve our own problems can we help others. Many of my patients have become healers, some despite having no interest in becoming one. But through their excitement in living and feeling great, others are drawn to them seeking answers for their ills. They share their knowledge; they share their hope.

But some of us have yet to awaken the healer within us. Yet that healer is in all of us. We must help each other to find the hope, the knowledge and the healing.

The following paragraphs will illustrate my evolution as a physician in the exam room:

- From conventional to integrative
- From practice guidelines to food and exercise suggestions
- From back operations and knee surgery to Tai Chi and massage

(d) ***Avoid Becoming A Patient on the Conveyor Belt of Disease Management***

Here are some common examples:

- Diabetes Type 2
- Asthma
- Crohn's Disease
- Celiac Disease

Disease management protocols are a consensus approach to a problem, which is usually the most conservative (but not necessarily the most effective) approach.

- ***Diabetes Type 2***: The medical community and the disease management protocols are just beginning to approach Diabetes Type 2 as a problem of insulin resistance and the dysfunctional modern diet. Most of the emphasis in the past has been on using oral medications and insulin to overcome the effects of the high starch diet the patients were consuming. In the attempt to lower blood sugars, we were causing further weight gain, even more insulin resistance, and actually a higher risk of cardiovascular death. Again it was felt that a diet like the Hunter-Gatherer Diet was unworkable for most patients. So we took the easy way out and gave these patients more and more medications. Some patients were given hundreds of units of insulin per day, which did little to overcome their insulin resistance and instead prompted even greater weight gain and complications. An intelligent Diabetes doctor from UNC taught me that it makes no sense to give patients with Diabetes more than 60 units of insulin per day. Instead he would bring the family in with the patient and hang crepe as in a funeral. This doctor would tell the family that the patient had a very serious (almost malignant) disease and needed to radically change the patient's approach to life, both in what the patient ate and how much they exercised. Sure, this didn't always work, but at least he wasn't just enabling the patient and family to continue in the path toward early death. If they chose not to, so be it, and vice versa. Part of the reason I have spent so much time trying to create a workable diet is I believe what we eat is the foundation of how we feel and how we age.

- ***Asthma***: Today a patient (who also happens to be a pediatrician) called me for an exacerbation of asthma. I asked him if he knew that milk makes more mucus. He told me that he was quite aware of the fact, and avoided all dairy products if he was having an exacerbation. He had trained in Seattle with Gail Shapiro, MD who

has done extensive work on the effect of food sensitivities on allergies and asthma. I complained to him that many do not seem to know about the effect of diet on allergies. I have never seen a monograph on asthma that mentioned anything about diet and asthma (they are always pushing medications-why would they include information that might make the medications appear less useful?).

- ***Crohn's disease***: This is a disease of inflammation of the whole intestinal tract (one of the inflammatory bowel diseases). I attended the Internal Medicine Update at Harvard Medical in the fall of 2001. There was a talk on Inflammatory Bowel Disease(IBD), during which the professor spent much time on the use of medications in the disease. Fortunately, in the handout, there were abstracts of articles about the treatment of Inflammatory Bowel Disease. Two of these articles discussed the use of diet in the treatment of Crohn's disease. One discussed the use of an elemental diet in patients with steroid refractive disease (not responding to even the most aggressive conventional therapy).[7] Ninety percent of the patients had remission of symptoms by removing grains and dairy from their diet. My two patients with Crohn's have had their disease go into complete remission using *The Mediterranean Hunter-Gatherer Diet*. Now the conventional medical approach considers using bone marrow transplantation to treat Crohn's. These physicians are the same individuals who suggest that a strict diet without grains or dairy is unworkable. But what they may not be completely honest about is that a diet without grains or dairy probably never killed anyone, but autologous bone marrow transplantation has a small but finite risk of death.

- ***Celiac Disease*** (Gluten-Sensitive Enteropathy): one out of every 100-200 people has Celiac Sprue. This is a disease in which the proteins in wheat cause inflammation in the small intestine leading to poor absorption of nutrients, stomach pain, diarrhea, and other problems including lymphoma and arthritis. Most physicians do not give Celiac disease much thought because it is felt that the treatment (a very strict grain-free/gluten-free diet) is very difficult and usually unworkable. Yet many people suffer with intractable intestinal problems even into their 70's because we are not looking for this disease. Even in my practice of 3,000 patients I have only diagnosed 5 patients with Celiac Sprue. Which means I need to find the 10 to 20 others with Celiac disease. Although if my patients follow the Mediterranean Hunter-Gatherer Diet, they will not have any problems as this is gluten-free (except the occasional wheat starch used in processed or prepared foods). The conventional recommendation for patients with Celiac disease tends to be a very high sugar diet. I believe people can do better than eating marshmallows and drinking Coke (both gluten-free and fat-free but very unhealthy). That is why I suggest the Mediterranean Hunter-Gatherer Diet.

[7] Hunter JO. Nutritional factors in inflammatory bowel disease. *Eur J Gastroenterol Hepatol* 1998 Mar;10(3):235-7.

So what happened to the healing arts? Can you avoid this conveyor belt of disease management? Instead of managing your disease, how about listening to your body (for once!) and making your disease go away. Is your doctor trained to help you do this?

No.

(e) ***The Response of Conventional Medicine***

If you have a problem, we have the following possible responses:

- We order a blood test or two
- We prescribe a pill or three
- We issue a referral to a specialist who will look at you as a shoulder or a stomach or a heart or a colon or a nut case
- We will order a diagnostic procedure on you to find out what's wrong
- We will do surgery to get you better (because we can fix your shoulder or back or knee or nose)

It is time to have an open mind; it is time to seek solutions outside of the conventional answers. We need to rediscover how to deal with higher levels of uncertainty in our practice of medicine. We used to be able to do this. We used to do much less testing and treated patients first with a therapeutic trial. An example of this includes trying physical therapy for knee problems instead of MRI scan and knee surgery. Another is doing a stress test and cardiac rehabilitation following a heart attack instead of cardiac catheterization and angioplasty (they put a tube into your heart and use a balloon to dilate your blood vessels) because using this balloon dilation has not been shown to prolong life.

It turns out that most of the lumbar laminectomies (back operations) done over the last 30 years did not need to be done (close to 90% according to estimates by the Rand Group) because surgery did not appear to improve outcomes when assessed at 7 years. The same appears to be true of many of the knee surgeries. Most patients improve and can return to normal function with aggressive rehabilitation instead of surgery. The patients who definitely need surgery are those with locking, giving way, and/or significant recurrent swelling of their knees.

(f) ***Thinking Outside the Box***

Is your face looking older? Of course it is, but why? The answer is simple:

- Glycation: sugar molecules binding to proteins in your skin (and blood vessels, heart muscles, etc.) cause the proteins to cross link making the tissues stiff and yellow.

- Oxidative damage: The appearance of aging in your face mirrors the aging of your whole body. Let us take smokers for an example. Carbon monoxide from cigarette smoke (and other sources) greatly promotes oxidative stress not only causing wrinkles in your face but the aging of your body. The carbon monoxide blocks a critical pathway the body uses to degrade superoxide radicals, the chemical complexes that destroy bacteria, viruses, and normal cells that get in the way. If these complexes build up in your system, they cause damage and cell death.

- Auto-Immune Phenomenon: Our immune system attacking our tissues because of toxins we ingest or because our immune systems become out of balance due to certain proteins in our diet (sulfites in wine, peanuts, or milk protein) or infections we contract (such as Lyme disease, mycoplasma and Parvovirus B-19).

- A negative attitude and belief in aging rather than healing.

(g) ***A New Look At Old Problems***

But do not reach for the Retin A yet- that is cheating, and only masks the underlying process and gives you the false impression you are beating the system. But imagine trying to get your face healthier by living and eating right. You might not consider that worthwhile unless the changes actually allow you to feel better now, and in five, ten, twenty years.

Successful aging is predicted by the following, according to the Harvard Study on Aging:[8]

- Highly satisfying life partnership with spouse or significant other
- Highly satisfying relationships with your children and/or friends
- Highly satisfying income-producing work
- A sense of humor when things are not quite working out the way you wanted

[8] Vaillant GE. *Aging Well*. (Boston: Little Brown, 2002).

2 Negative Attitudes Lead to Negative Effects on the Body

A rabbit heart disease study comes to mind. Dr. Cornhill studied a group of rabbits that were bred to develop atherosclerotic heart disease (hardening of the arteries).[9] Two-thirds of the rabbits at autopsy had severe heart disease but a third did not. It was finally determined that the third of rabbits that did not develop heart disease were the rabbits that had been in the cages in the middle row (not the top or bottom rows). One of the technicians caring for the rabbits routinely took the middle row rabbits out of their cages to play with them. The others were left in their cages. The results were duplicated in a subsequent study. When I told this to a friend of mine, he turned away shaking his head muttering *Then I'm dead*. Evidently his wife does not take my friend out of his cage often enough to caress and play with him.

(a) *Men and Stress*

Men are a lot like rabbits; we need to be taken out of our cages sometimes and cuddled. But the same is true of the female of the species. So whatever it takes to get your relationship with your life-partner on a better footing, do it. It will be worth it. If you need help relating to and appreciating your spouse, see Appendix Five in Volume 2 for the nine ways we respond to stress. If you can come to appreciate that when your spouse is stressed out s/he becomes angry, belligerent, hostile and controlling, you will stop taking it personally every time they explode. You will instead put your arm around them and ask them *what is wrong, dear?* Yeah, right. But it works.

3 Positive Attitudes Lead to Positive Effects on the Body

(a) *Family Life Predicts Longevity*

A good relationship with our children and/or friends requires us to let them be themselves. Play to their strengths and support them in their struggles. Sometimes we need to let go of our aspirations for them and help them reach for their *own* goals successfully. A patient suggested the advice for stressed parents of college age students and older: *Hold them close with open arms.*

[9] Nerem RM, Alevesque MJ, Cornhill JF. Social environment as a factor in diet-induced atherosclerosis. *Science* 208(4451):1475-6, 1980 Jun 27.

(b) *Work Is Good For You*

Meaningful paying work can occur anywhere doing almost anything in a community that you value and trust. Be it art, medicine, business, music, childrearing, teaching, counseling, or spiritual leadership, ask for what you need and stick to your list. Do not sell yourself short. Open your eyes to the needs of others and society and fill those needs (after establishing adequate financial backing, of course).

(c) *Laughter: The Best Medicine*

Humor is the key to survival. Make fun of how bad things seem to be. It can take the edge off. Work together with others to enhance the situation. But always try to sustain your sense of humor. The most successful old person I've met is a 96 year old man who has had both recurrent colon cancer and bladder cancer, not to mention breaking his back several times (vertebral compression fractures) from falling. He still rolls his own cigarettes using pipe tobacco and drinks George Dickel whiskey as well as the occasional Dos Equis. He has never lost his sense of humor despite all of the physical insults (among others) he has suffered. He has also continued to work as a children's book illustrator and was remarried 13 years ago to a women in her late 40's. A month before they were married, she caught him in bed with another woman (a woman from the hair salon at that). His fiancée said *How could you do this to me?* He explained that it was nothing against her but that when an unmarried man his age (then 83 years old) gets an offer like that he just has to take it. She accepted that, took him as he was, and their marriage together has been wonderful. They have remained devoted to each other. Both are remarkable people.

Excess Insulin and Sugar Promote Aging and Early Death

If you don't super-size your fries and soda,
How are you ever going to get to be 300 pounds?

A Fast Food Worker

2

AGING: POSTPONING THE INEVITABLE

1 Are You Feeling Great?

So, are you feeling great? If not, why not? If you feel tired, why are you so tired? If you feel tired today, imagine how you might feel in five to ten years? It won't be pretty. But how can you make such a tremendous change in your life as growing younger when you feel less than great? Have you seen people jogging and wondered how they had the energy? Have you tried innumerable times to start exercising (punishing?) but after several days stopped because *What was the point; I still don't feel well?*

(a) *How do we get past the fatigue and malaise?*

Listen to your feelings, your body. *If you are not feeling great, there is something wrong.* Our bodies are designed to perform at a high level almost indefinitely (approximately 130 years is the best estimate), and some individuals almost accomplish this. What is wrong with the rest of us? Are we not as good people? Is it some psychological problem we are unable to circumvent? Is struggling through life our destiny?

Actually, we all create our own destinies through our thoughts and actions. We have a choice, but we must start listening to our bodies and trusting ourselves and how we are feeling. Much of what we have been led to believe is not true. *What is good to eat? What is not good to eat?* There is little evidence at this time to support the low fat diet, which has made many people not feel well for so long. It is time we started thinking for ourselves and trusting our feelings and our bodies.

(b) *What could be causing this fatigue we experience?*

Most of us push our bodies hard, working too much, staying up too late, eating just to keep going. If we are tired, we often do not rest, but instead reach for something to keep us going. Coffee, Coke, chocolate, alcohol, whatever. But this fatigue does not arise from working too hard. It arises from the chronic over-release of adrenaline that accompanies our lives. What causes these high adrenaline levels? It is not what you think. Psychological stresses account for some of this, but many people also suffer from insulin resistance with high insulin levels and/or chronic allergic conditions. At least some of this arises from our diets. In this book we will explore what causes higher insulin levels and what it does to our bodies. We will also look at chronic allergies and their impact on health and aging.

2 The Problems of Aging

Aging continues on a daily basis, but we can slow the inevitable. In the table below are listed some of the major problems of aging. By understanding what is causing these problems, we can begin to address the various underlying etiologies before they steal away our health and longevity.

Look carefully at the following table to determine what problems of aging are most problematic for you. Then study their cause. We will look at the top nine ways to reduce aging. When you know which are the most important you will know where you need to focus and which ones you can play with a little.

TABLE 2-1: PROBLEMS OF AGING

Problems of Aging	Underlying Causes
Weak muscles (reduced muscle mass)	Inadequate or unbalanced nutrition (particularly protein deficiency and chromium deficiency) Lack of resistive exercise
Brittle bones (osteoporosis)	Inadequate nutrition (magnesium and calcium) Lack of resistive and weight bearing exercise Smoking / excess alcohol use Vitamin K deficiency / Vitamin D deficiency
Stiff blood vessels (atherosclerosis leading to heart attacks and strokes)	Vascular inflammation leading to atherosclerosis (diabetes, IGT, homocysteine, infections, oxidized LDL cholesterol) Excess iron; Vitamin K deficiency
Cancer of breast, prostate, colon, pancreas	Growth factors for tumors (insulin and insulin-like growth factors <IGF> from diabetes and impaired glucose tolerance <IGT>), Nitrites (colon)
Cancer of lung, colon, cervix, throat, esophagus, and bladder	Tissue inflammation leading to precancerous changes and cancer (smoking, nitrites, distilled liquors consumed undiluted, ?smoked fish)
Slowed nerve function (peripheral neuropathy leading to poor balance and numb feet)	Diabetes and impaired glucose tolerance (IGT) Vitamin B-12 deficiency Low thyroid function Toxins (excess alcohol)

Stiff heart (cardiomyopathy leading to congestive heart failure, atrial fibrillation and other arrhythmias)	Diabetes and impaired glucose tolerance (causing excess glycation- glucose acting as molecular glue) Hypertension (from stress, sleep apnea, allergies) Excess alcohol; magnesium deficiency Excess iron
Liver disease	Excess alcohol Excess iron Chronic viral hepatitis
Reduced kidney function (renal insufficiency)	Hypertension Diabetes and impaired glucose tolerance
Joint pains (arthritis)	Autoimmune inflammation arising from infections such as Lyme disease and Mycoplasma (walking pneumonia); reaction to inflammatory bowel disease or psoriasis; gout; Nightshade vegetables? Diabetes and IGT (frozen shoulder); excess iron
Enlarged prostate (BPH)	The $64,000 question (Is insulin a growth factor? It appears to be at least for prostate cancer)
Reduced vision (macular degeneration and cataracts)	Impaired absorption and vitamin deficiency (Vitamin B-12, vitamin D, lutein, Vitamin K, chromium) Diabetes and impaired glucose tolerance
Loss of memory (Alzheimer's and other neuro-degenerative diseases)	Mitochondrial gene deletions due to oxidative stress Toxic exposures (smoking and excess alcohol) Infections (Mad cow disease, Cruetzfeld-Jacob) Vitamin K deficiency Diabetes and impaired glucose tolerance

As You Go Through This List, A Few Things Jump Out

- Diabetes and Impaired Glucose Tolerance (IGT or pre-diabetes) appear frequently.
- Nutrition seems to have more importance than we give it credit.
- Arthritis (which may be preventable) cripples our ability to act young and active to maintain muscle and bone health
- Inflammation is bad, be it in blood vessels, joints, intestines, liver or lungs.

- Cigarette smoking is bad (causing wrinkles inside and out)
- Alcohol is a two-edged sword
- Donating blood is healthy (eliminates excess iron and checks for chronic liver disease)

If we could avoid whatever it is that causes our joints to become inflamed, we should be able to avoid or at least postpone arthritis. Could it possibly be certain foods (corn consumption is associated with arthritis in dogs) or infections (Lyme disease and Parvovirus B-19 for example) or nutritional deficiency (the supplementation of sulfur in glucosamine and MSM improves arthritis)?

Is your face wrinkling? Sure it is, but don't use Retin-A (the acne medicine that improves wrinkles) or get Botox injections. Your face is a good indicator of internal aging through the processes of glycation (sugar acting as molecular glue) and oxidative stress, not to mention apoptosis (programmed cell death when the cell just runs out of time and energy). But to fully appreciate the wrinkles in your face you must understand what is causing them. Only then will you be able to begin to heal them and slow further wrinkling.

A few key concepts to understand as we undertake growing younger and reduce wrinkling in a healthy way for the whole body.

(a) *To Be Stiff Is To Be Old*

Glycation: sugar acting as molecular glue, making all of our tissues stiff and yellow. This stiffening occurs in the skin (which we can see) as well as our heart, muscles, blood vessels, joints, and intestines. One of the major differences between the young and old is the pliability of our tissues. To be stiff is to be old. Much of this stiffness is due to glycation. To avoid excess sugar, Diabetes, and Impaired Glucose Tolerance (IGT), we can markedly reduce the accumulation of this glue that slows us down.

(b) *Light Cigarettes cause more Damage than the old short Lucky Strike?*

Oxidative stress from super-oxide radicals (also known as reactive oxygen species): Our bodies use these super-energy oxygen molecules to destroy bacteria, viruses, and damaged tissues. They are therefore useful substances when in the correct setting. The problem arises when they accumulate inappropriately in the cell and begin to damage the structure of the cell itself.

Super-oxide radicals are a byproduct of the metabolism of glucose. When we burn sugar as fuel we create more oxidative stress. The body has many mechanisms for absorbing this energy and turning it back into safer, lower-energy molecules, but this requires the presence of significant amounts of anti-oxidant molecules to recycle the energy. Two problems can occur: we deplete our anti-oxidant molecules or we consume substances that block our ability to recycle this energy safely. One of the main substances that block this recycling is carbon monoxide in cigarette smoke and automobile exhaust.

Light (and ultralight) cigarettes produce much less tar (tar causes chronic lung disease) and nicotine (associated with the addiction). The flip side is they produce much more carbon monoxide per nicotine dose than the old heavy cigarettes. Since people smoke for the nicotine, they are receiving much higher doses of carbon monoxide to maintain their therapeutic nicotine level. Physicians used to think that low levels of carbon monoxide were not bad because there was still plenty of oxygen being carried to important organs by the blood. Recently, however, researchers at Duke University discovered that even low levels of carbon monoxide block the recycling of super-oxide radicals and thereby cause significant oxidative damage in all cells.

Cahill has shown that when the body burns fat as fuel (the ketogenic diet; both the Atkins' and the Mediterranean Hunter-Gatherer diets are ketogenic), the main byproducts are carbon dioxide and water.[10] This is like burning natural gas (a much cleaner fuel burning to carbon dioxide and water) instead of gasoline (which has numerous toxic byproducts). Therefore it appears that not only is the body more efficient burning fat as fuel, this may be the anti-aging approach because of the reduced oxidative stress.

As these super-oxide radicals accumulate, damage begins to occur. The worst of this is deletion of important genes (DNA) in our mitochondria (the parts inside our cells that make the energy for the cell to work and repair itself; pronounced my-toe-**kon**-dree-a).

(c) *Eve and the Loss of Eden: Mitochondrial Gene Deletion*

We call her Eve.[11] She was born in central Africa 73,000 years ago. It is believed we are all related to Eve through our mitochondria, the powerhouse of our cells. We receive all of our mitochondria from our mothers in the cytoplasm of her egg. The father's sperm only provides half of our body's genes but no mitochondria. We know we are related to Eve because Eve's mitochondria have more similarities to the mitochondria of people around the world than any other prehistoric person found. Mitochondria have their own DNA (they were probably once free living parasites that infected the cells of our ancestors). If damaged they do not produce enough chemical energy making the cell less able to repair itself.

(1) Why are Mitochondrial so Important?

Our cells are constantly being damaged by our environment and by what we eat and don't eat. We are constantly producing cancer cells, and constantly killing cancer cells. We are constantly repairing and replacing most of our bodies. ***We need tremendous amounts of chemical energy to do this***. We count on our mitochondria to provide this energy, and yet we have been deleting mitochondrial genes since our mid-twenties and thereby severely impairing the ability of our bodies to repair themselves. We must start protecting our mitochondria (the ones we have left).

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[10] Veech RL, Chance B, Kashiwaya Y, Lardy HA, Cahill GF. Ketone bodies, potential therapeutic uses. *IUBMB Life* 2001 Apr;51:241-7.

[11] Wallace DC. Mitochondrial DNA in Aging and Disease. *Scientific American* Aug 1997.

(2) How can we protect our mitochondria?

Dr. Douglas Wallace described how super-oxide radicals cause gene deletions and how the body has antioxidants to reduce the damage by reducing the super-oxide radicals.[11] These antioxidants included Vitamins E and C, and coenzyme Q10. The problem is when taken as pills, these antioxidants do not appear to significantly improve outcomes in most clinical trials. If we are going to improve our chances of avoiding many degenerative diseases including Alzheimer's Disease, congestive heart failure, and diabetes, we are going to have to figure out how to maintain our body's ability to produce these antioxidants and reduce oxidative stress. Burning fat as fuel rather than sugar appears to be one of those answers. As was mentioned above, burning fat as fuel helps to recycle the protective effect of vitamin E and coenzyme Q-10. Eating rare meat is an excellent source of L-carnitene, another important antioxidant and anti-aging compound. Strange as it may seem, we should avoid the symbolic apple (more sugars than are allowed in a day on the ketogenic diet).

(3) Can we just take vitamins to prevent aging?

Nearing all of the information showing benefit from antioxidant vitamins comes from nutritional studies where people ate foods rich in antioxidants (nuts, oils, leafy vegetables). Most of the pill-based studies have shown little or no benefit. Taking large doses of one supplement may disturb the balance of vitamins and actually promote disease.

(d) *Apoptosis (Programmed Cell Death, pronounced eh-pop-TOE-sis)*

All of our cells are programmed to last a certain time and then turn off and die. This is called apoptosis. The control of this process is complex but one switch appears to be linked to the insulin receptor. When you block the insulin-like receptor in the worm Caenorhabditis elegans, the worms live twice as long.[12] When rodents are fed low calorie diets or alternate day feedings, they also live up to twice as long.[13] [14] Insulin appears to trigger cellular processes that promote aging. Raising insulin levels accelerates most markers of aging (heart disease and cancer included) and lowering insulin action appears to slow aging (at least in the worm and rodent).[15]

So how do we reduce this programmed cell death? It is clear that patients with Type 2 diabetes, impaired glucose tolerance and insulin resistance age much faster. The good indicator of insulin resistance is the circumference of your waist. It would therefore

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[12] Ogg WC, et al. *Nature* 1997; 389:994.
[13] Weindruch R, Walford RL. *The retardation of aging and disease by dietary restriction*. (Thomas, Springfield, IL, 1988).
[14] Bruce-Keller AJ, Umberger G, McFall R, Mattson MP. Food restriction reduces brain damage and improves behavioral outcome following excitotoxic and metabolic insults. *Ann Neurol* 1999 Jan;45:8-15.
[15] Lee C, Klopp RG, Weindruch R, Prolla TA. Gene expression profile of aging and its retardation by caloric restriction. *Science* 1999 Aug;285:1390-3.

appear critical to reduce the circumference of your waist by whatever means you can (short of Fen-Phen or other like drugs). You could say this is the sole purpose of this book; we must reduce our caloric intake in a healthy manner.

(e) *What Is Incomplete Carboxylation?*

Three common complications in aging include atherosclerosis (hardening of the blood vessels leading to heart disease and strokes), osteoporosis (weak bones) and Alzheimer's disease (memory loss). All three of these are worsened by incomplete carboxylation of the Gla proteins in our blood vessels, our bones and our brain.[16] This occurs because of the lack of adequate vitamin K in our diets and therefore in our tissues. The recommended daily allowance (RDA) recommended by the USDA is based on maintaining adequate blood clotting factors, which is probably one-tenth the amount required for optimal health of our blood vessels, bones and brain. The best source of vitamin K is the serious dark green leafy vegetables (see the Mediterranean Hunter-Gatherer diet below) eaten with some healthy fat (vitamin K is fat-soluble and requires fat to be absorbed).[17]

Eat your green leafy vegetables.

(f) *Allergies, inflammation, aging and cancer*

Allergies lead to inflammation of your upper and lower airways. Inflammation leads to aging and cancer. Do not take medications that control your allergy symptoms. Figure out what is promoting your allergies and get rid of it. Milk protein, sulfites in wine, peanuts, and Tartrazine (yellow dye FDA #5) promote an inflammatory reaction to dust, mold, mildew and animal dander in many individuals.[18] This also applies to allergies related to the pollen of trees and grasses. Try the Mediterranean Hunter-Gatherer diet, which eliminates most of the common triggers for allergies. If you are going to consume chocolate or other triggers, try to do it only intermittently (1-2 times per week at most).

3 Top Nine Ways to Slow Aging

(a) *Prevent or heal your diabetes or impaired glucose tolerance (insulin resistance)*

Diabetes is an excellent model of aging. The resulting glycation makes us stiff. Elevated insulin levels promote heart disease, cancer, and apoptosis (early death).

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[16] Vermeer C, Schurgers LJ. A comprehensive review of vitamin K and vitamin K antagonists. *Hematol Oncol Clin North Am* 2000 Apr;14(2):339-353.

[17] Booth SL, Sadowski JA, Pennington JAT. Phylloquinone (vitamin K_1) content of foods in the U.S. Food and Drug Administration's Total Diet Study. *J Agric Food Chem* 1995;43:1574–9.

[18] Dixon HS. Treatment of delayed food allergy based on specific immunoglobulin G RAST testing. Otolaryngology-Head and Neck Surgery 2000 Jul:123:48-54.

(1) How do you know if this is a problem?

Look at the circumference of your waist. A waist more than 40 inches in men and 35 inches in women are considered high risk. To be less than 35 inches in men and 30 inches in women are considered acceptable, but the smaller the better. As your waist goes, so does your insulin level.

(2) Measure your insulin level.

Normal fasting insulin levels are up to 27, but anything over 10 is considered suspect for insulin resistance. A level of 5 or less is considered ideal.

(3) Measure your hemoglobin A1c.

This is the three-month diabetes test that looks at your average blood sugar. A level over 6.1% is abnormal but anything over 5.0% increases death through heart disease and cancer.[19] The same is true of your blood sugar. A level of 110 is considered normal but anything over 90 is suspect for pre-diabetes. Follow the Mediterranean Hunter-Gatherer diet to shrink your waist and make your diabetes or insulin resistance go away.

(b) ***Eat the Best Foods; Avoid the Worst***

The Mediterranean Hunter-Gatherer diet is a very-low-carbohydrate diet that is rich in omega-3 oils, monounsaturated fat, green leafy vegetables, and healthy protein from fish, meat and poultry. You can eat lots of nuts and even a few berries but no grains, potatoes, or other high starch or sugar foods. Avoid excess omega-6 oils in vegetable oils.

(c) ***Avoid Excess Calories***

Reduced calories but complete nutrition is associated with greater longevity. This may be an effect of low insulin levels or lower oxidative stress. The Mediterranean Hunter-Gatherer Diet is designed to keep you satisfied while lowering caloric intake.

(d) ***Don't Smoke; Avoid Nitrites and Other Preservatives***

Carbon monoxide leads to excess oxidative stress. Tars lead to inflammation and chronic lung disease and cancer. Nitrites lead to inflammation of the colon, which leads to polyps and cancer.

[19] Khaw K, Wareham N, Luben R, Bingham S, Oakes S, Welch A, Day N. Glycated haemoglobin, diabetes, and mortality in men in Norfolk cohort of European Prospective Investigation of Cancer and Nutrition (EPIC-Norfolk). BMJ 2001 Jan;322:15-18.

(e) ***Get off the Couch and Take the Stairs***

(1) People who live in a multistory house develop fewer heart attacks (Is it the stairs or is this just a marker of more money equals better health).[20]

(2) The greatest benefit from exercise occurs when you get off the couch and go for a walk. There is little additional benefit (other than stress reduction) from increasing this to jogging or cycling or marathon running.

(3) In order to exercise we must avoid arthritis and other limiting illness, so take the MSM and avoid the foods associated with arthritis (corn meal in dog food is associated with arthritis in dogs- feed your dog meat).

(f) ***Take just a Few Supplements***

(1) Older rodents given chromium behave like younger rodents.[21] Could this be fooling the hypothalamus into releasing youth hormones?

(2) Magnesium is key to bone and heart health.[22]

(3) So is vitamin K, but get it from your green leafy vegetables.

(4) If you don't drink fresh rainwater or eat living things, take MSM.

(g) ***Avoid Allergies and other causes of Inflammation***

Do you have circles under the eyes, puffy eyes, chronic runny nose and cough, recurrent sinus infections, and fatigue? Your body is screaming at you that something is wrong. Figure it out. Milk makes more mucus in most of us. So do the sulfites in wine, wine vinegar and balsamic vinegar. Wheat irritates some people, as does chocolate (the sex surrogate).

(h) ***Avoid Hostility and Depression***

Hostility releases hormones (such as angiotensin) that cause inflammation of the lining of blood vessels leading to atherosclerosis (strokes and heart attacks).[23] Depression is a manifestation of serious imbalance in your attitude and nutrition.[24] Change them both.

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[20] Personal communication with Bernardi F.

[21] McCarty MF. Longevity effect of chromium picolinate—'rejuvenation' of hypothalamic function? Med Hypotheses 1994 Oct;43:453-65.

[22] Resnick LM. Magnesium in the pathophysiology and treatment of hypertension and diabetes mellitus. Am J Hypertens. 1997;10:368-70.

[23] Libby P, Ridker PM, Maseri A. Inflammation and Atherosclerosis. Circulation 2002 Mar;105:1135-43.

[24] Wurtman RJ, Wurtman JL. Carbohydrates and Depression. Scientific American 1989 Jan.

An example of this is the morning commute. Birds do it differently (they cooperate). If we approach the commute as a team effort, each of us trying to help the others out (and helping the people who are late the most), the world would be more pleasant and healthier (based on our lower levels of hostility hormones (angiotensin) - see Chapter 15 in Volume 2 for details).

The Best Predictor of Disease and Early Death Is the Size of Your Waist

You consume only a certain amount of food in your lifetime.

Old Chinese Proverb

3

THE CIRCUMFERENCE OF YOUR WAIST

The circumference of your waist is an excellent measure of increased fat stores and insulin resistance (particularly if combined with an elevated triglyceride level).[25] The bigger the waist, the higher the percent body fat and usually the higher the insulin level. I interpret the old Chinese proverb on the previous page to mean you can eat it now or you can eat it later, but not both. Too much food is not good your health. This effect appears to be mediated through excess insulin.

1 What is Insulin Resistance?

Insulin is one of the hormones that helps control blood sugar. It is the hormone that helps lower blood sugar by facilitating the movement of sugar into our cells. Without insulin, sugar cannot move into cells and patients can become very ill with what is called diabetic ketoacidosis. In this case only is ketosis (the burning of fat as fuel) bad for you. If you have enough insulin, ketosis (burning fat) is actually healthy (see Chapter 11 for details). Despite very high blood sugars, these patients are starving to death because of the lack of insulin. This only happens, however, in patients with Type 1 diabetes. Type 1 diabetes is associated with the destruction of the cells that release insulin.

The vast majority of patients with diabetes have Type 2 diabetes, which is caused by the body becoming resistant to the insulin so the insulin stops working. These patients are not at risk for starvation. Instead of not enough insulin, they often have very high outputs of insulin but their cells have lost their ability to respond. These patients continue to gain more weight because they lose the receptors in their brain that tells them they are satisfied. The only help for these patients is to somehow lower their insulin levels.

How do you lower your insulin level? Get rid of the carbs please! We will discuss this extensively soon. First, let's start with examining the adverse affects of insulin. Then we will look at the stories of Anna, Stephen, Gregory and Mary (below) as illustrations of many of the adverse affects of insulin.

[25] Depres JP; Lemieux L; Prud'homme D. Treatment of Obesity: Need to focus on high-risk abdominally obese patients. *BMJ* 2001 Mar 24; 322(7288):716-20.

2 The Adverse Effects of Insulin

(a) *Excess insulin increases appetite making us hungry, even though we may have just eaten*

The evidence for this can be seen in any patient that is treated with excess insulin. It is impossible to lose weight if you are attempting to tightly control your diabetes using insulin. The DCCT trial[26] was a study of using intensive insulin management (versus standard care) in patients with Type 1 Diabetes. The patients in the intensive group uniformly gained weight (several kilograms each). There was a reduction in microvascular complications (problems of small blood vessels leading to kidney failure and eye disease). However, the adverse affect of hyperinsulinemia (high levels of insulin in your blood) including atherosclerosis leading to heart disease was unchanged.

(b) *Insulin also inhibits the release of fat from fat cells, making weight loss much more difficult*

Patients with Type 2 Diabetes treated with glyburide (a medication which raises insulin levels) had significantly more weight gain compared to the metformin group (a medication which lowers insulin resistance and is associated with weight loss in most patients). The patients on glyburide also had more heart disease.[27]

(c) *Excess insulin promotes the development of Diabetes Type 2 by increasing insulin resistance*

Increased abdominal fat leads to insulin resistance and Syndrome X resulting in Diabetes, hypertension, left ventricular hypertrophy (enlargement of your heart) and atherosclerosis (hardening of the arteries, heart attacks and strokes). Syndrome X is a constellation of problems seen in patients with insulin resistance.[28]

(d) *Excess insulin makes you crash 1-3 hours after eating with fatigue, lethargy, decreased ability to think*

Wurtman describes the association of Seasonal Affective Disorder, Carbohydrate-Craving Obesity, and Premenstrual Syndrome.[29] Most people experience fatigue and sleepiness and become prone to committing errors after a high carbohydrate meal.

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[26] Diabetes Control and Complications Trial (DCCT). *Am J Cardiol* (United States) May 1 1995;75(14):894-903.

[27] O'Keefe JH, Miles JM, Harris WH, Moe RM McCallister BD. Improving the adverse cardiovascular prognosis of type 2 diabetes. *Mayo Clin Proc* 1999;74:171-180.

[28] O'Keefe JH et al. Improving the Adverse Cardiovascular Prognosis of Type 2 Diabetes. *Mayo Clin Proc* 1999;74:171-180.

[29] Wurtman RJ et al. Carbohydrates and Depression. *Sci Amer* 1989 Jan; 68-75.

(e) ***Excess insulin damages blood vessels and thereby promotes coronary artery disease and strokes***

Many recent reports including one by Preuss indicate that insulin resistance with hyperinsulinemia (high insulin levels) and/or hyperglycemia (high blood sugar) contribute to or even cause many chronic disorders associated with aging, i.e., chronic metabolic abnormalities including Type 2 diabetes mellitus, obesity, hypertension, cholesterol abnormalities, and atherosclerosis. [30]

In aging, similar to diabetes, the elevation in circulating glucose and other reducing sugars secondary to age-induced insulin resistance can react with proteins and nucleic acids (our genetic material) to form products that affect function and diminish tissue elasticity.

Also, adverse changes in glucose/insulin metabolism are associated with enhanced lipid peroxidation (damage to all cell membranes) secondary to greater free radical formation. Free radicals of oxygen are important known causes of tissue damage and have been associated with many aspects of aging including inflammatory diseases, cataracts, diabetes, and cardiovascular diseases. Augmented free radical formation and lipid peroxidation are not uncommon in diabetes mellitus, commonly associated with premature aging.

(f) ***Excess insulin promotes the growth of cancer cells***

In a prospective study of 535 women with breast cancer, Goodwin found that the 20% of women with lowest insulin levels had 4% recurrence of their breast cancer over 7 years, while the 20% of women with highest levels had 32% recurrence.[31]

Goodwin has also shown that insulin levels are elevated in women with premenopausal breast cancer.[32] This association may reflect an underlying syndrome of insulin resistance that is independent of obesity. All results were independent of diet and other known risk factors for breast cancer. It has also been shown that metformin (a medication for diabetes that reduces insulin resistance) prevents pancreatic cancer induction in hamsters.[33] The results lend further support on the significant role of islet cells in pancreatic carcinogenesis and may explain the association between pancreatic cancer and obesity, which is usually associated with peripheral insulin resistance.

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[30] Preuss HG. Effects of glucose/insulin perturbations on aging and chronic disorders of aging: the evidence. *J Am Coll Nutr*. 1997 Oct;16(5):397-403.

[31] Goodwin PJ et al. Insulin Resistance predicts recurrence of breast cancer. Abstract *Amer Society of Clinical Oncology.* May 2000.

[32] Goodwin PJ et al. Insulin and related factors in premenopausal breast cancer risk. *Breast Cancer Res Treat* 1998 Jan;47(2):111-20.

[33] Pour PM et al. Prevention of pancreatic cancer induction in hamsters by metformin. *Gastroenterology* 2001 Apr;120(5):1263-70.

(g) *Excess insulin promotes depression by altering brain glucose and serotonin levels*

Wurtman has described a syndrome of Carbohydrate-Craving Obesity (CCO) in which people have a disordered response to carbohydrates which impairs the effect of increased tryptophan and serotonin on the brain.[34] People with CCO report feeling refreshed and invigorated after eating carbohydrates, but the effect may take the consumption of large amounts of carbohydrates and be short-lived requiring frequent refeedings. The avoidance of simple sugars or the taking of Serotonin-raising medications appears to improve this. In one of the ongoing prospective trials of Atkin's diet, Westman has shown that not only have the subjects lost weight, 95% report more energy, 87% report less heartburn, 85% report improved mood, and 67% of women report less menstrual cramping and less premenstrual symptoms.[35]

(h) *Excess insulin speeds up the cellular clock and causes premature cell death*

Although the underlying mechanisms of aging are not understood, it is known that an insulin/IGF-signaling pathway modulates the longevity of the worm Caenorhabditis elegans.[36] The focus now is on how this pathway is regulated, how it controls nematode (the C. elegans worm) aging, and how this relates to the aging process in higher animals.[37]

3 But is this Mediterranean Hunter-Gatherer Diet the correct diet to lower insulin resistance?

(a) *Doc, You've Got to Try The Zone*

Patients talked about the Atkins' Diet and the Zone Diet. I really wasn't interested. We (the medical establishment) used the diet based on the food pyramid (USDA approved). Then I found the preface to a book entitled The Schwarzbein Principle. The book was a summary of what a diabetes doctor had discovered listening to and working with her patients. Dr. Schwarzbein had recommended her patients eat the American Diabetes Association low-fat high-starch diet, but her patients told her after they ate a meal of pasta, bread, potatoes or rice, their blood sugars would be 50 to 100 points higher. Eating this diet required higher doses of medications, which in turn promoted weight gain,

[34] Wurtman RJ et al. Carbohydrates and Depression. Explores the association of Seasonal Affective Disorder, Carbohydrate-Craving Obesity, and Premenstrual Syndrome. *Sci Amer* 1989 Jan; 68-75.
[35] Eric Westman MD, Duke/Durham VA Abstract presented at the Society of General Internal Medicine in New Orleans, February 2000.
[36] Parr T. Insulin Exposure and Unifying Aging. *Gerontology* 1999, 45: 121-135.
[37] Gems D et al. Insulin/IGF signaling and aging: seeing the bigger picture. *Curr Opin Genet Dev* 2001 Jun;11(3):287-92.

which again worsened their diabetes. This was a vicious cycle, which almost invariably ended in severe vascular disease, heart attacks, strokes, and the amputation of legs.

(b) *Those who cheat the most win*?

Perhaps the diet they were eating was making them sicker by causing their blood sugars to be higher. Dr. Schwarzbein told them to experiment with their diets and see which foods caused the least hyperglycemia (high blood sugars). The patients who cheated the most had the lowest blood sugars. These were the patients who ate bacon and eggs, steak with onions, cheese, and Brussel sprouts with mayonnaise.

(c) *It's The Pasta, Bread, Potatoes and Rice*

Eating pasta, bread, potatoes, and rice had caused their blood sugars to rise rapidly. Eating fat and protein did not. Starch turned to sugar, which required a higher insulin level. A higher insulin level increased appetite and promoted weight gain and worsened diabetes. The high insulin level also promoted the development of atherosclerosis (heart disease, strokes, and peripheral vascular disease leading to amputations) and cancer (insulin has a growth hormone-like effect on cancer cells). And since fat does not promote the release of insulin, eating fat required much less insulin and so promoted weight loss by reducing hunger. Protein also required much less insulin, as did non-root (non-starch) vegetables.

Dr. Schwarzbein was shocked. When she looked for the clinical studies supporting the low-fat high-starch diet, she found none. All of those pretzels and pasta, bread, potatoes and rice in the AHA Prudent diet were rapidly metabolized to sugar and caused rapid insulin release. This increased hunger, weight gain, and worsening of diabetes, high cholesterol and high blood pressure. I also was shocked and disappointed in the medical establishment and the US Department of Agriculture. I decided to try *The Zone*.

(d) *Experiment On Yourself*

First I tried it on myself. By nearly eliminating the sugar and starch from my diet, I lost 22 pounds (almost effortlessly from 166 to 144 pounds, after years of struggling with my gut). My cholesterol dropped from 210 to 160mg%. My LDL (bad cholesterol) fell from 130 to 60mg%, and my HDL (good cholesterol) rose from 72 to 91mg%! My LDL/HDL ratio was now 2/3. It seemed to work. My patients had similar experiences. I have had numerous patients lose over 50 pounds and many more lose 20 to 30 pounds. One patient's LDL cholesterol fell from 250 to 150mg%, another's from 230 to 130mg% on diet alone. My patients with diabetes have either gotten rid of their insulin injections altogether or decreased them from 70-90 units per day to 10-20 units per day, and have lost weight (and lots of it). Several patients who had recently developed Type 2 diabetes made their diabetes go away.

How do we start? Well, let's look at some examples of some successful and not so successful patients. The following five patients will illustrate the effect of excess insulin and glycation (excess sugar). See the chapters on allergy and the autoimmune response for specific examples of the adverse immune response.

(e) ***Before we start, let us define some of the important parameters***

(1) Glucose: Blood sugar

Normal range is 70-110 mg%
Ideal is less than 90 mg%

(2) Hemoglobin A1c: the diabetes test

Normal range is from 3.8-6.1%.
Ideal is 5.0% or less.
Each 1% increase above 5.0% is associated with 28% more death over 4 years.[38]
Our normal range appears to still be set too high for health
Levels above 7.0% are considered very harmful, yet the average A1c of patients with diabetes in the USA is over 9.0%

(3) Cholesterol

Composed of LDL, HDL, VLDL and Triglycerides, the total cholesterol level is not as helpful as the level of each separate element.
Ideal is 160mg% unless your HDL is very high. A level of 160mg% is associated with the lowest total mortality. People with levels of 100mg% had the same mortality as people at 200mg%, the difference being the people at 100mg% had less heart disease but more cancer, homicide and suicide.

(4) LDL Cholesterol: the bad cholesterol

Levels less than 100mg% carry a low risk of heart disease. This is the goal in patients with heart disease and stroke, and patients with diabetes
Ideal is less than 80mg%.
Levels over 160mg% carry a much higher risk and medication could be considered even without heart disease or diabetes.
Levels over 190mg% should be treated with medications in most patients (except perhaps young women with no other risk factors).

[38] Khaw K, Wareham N, Luben R, Bingham S, Oakes S, Welch A, Day N. Glycated haemoglobin, diabetes, and mortality in men in Norfolk cohort of European Prospective Investigation of Cancer and Nutrition (EPIC-Norfolk). *BMJ* Jan 2001, 322:15-18.

(5) HDL Cholesterol: The good cholesterol

Average for men and postmenopausal women is 45mg%.
Average for premenopausal women is 55mg%.
Ideal is greater than 55mg%.
Less than 35mg% is considered a significant risk factor.
HDL levels are suppressed by diabetes and by a low fat diet.
Olive oil, exercise and alcohol raise HDL levels.

(6) Triglycerides: Predictor of diabetes?

Often very elevated in patients with uncontrolled diabetes.
Ideal is less than 50mg%. Less than 100mg% is good.
Part of the metabolic syndrome (Syndrome X) of diabetes, obesity, hypertension and heart disease.
Now considered an independent risk factor for heart disease.

(7) Weight

There is no ideal weight or BMI, although a BMI of 22 or less is associated with less disease and death.[39]
A better measure is the percentage of body fat.
An easier measure is the circumference of the waist (at the umbilicus, better known as the belly button). A good waist circumference is 30-34 inches or less, depending on how tall you are.
An increase in waist circumference is associated with increased insulin resistance and Syndrome X.

(8) Insulin

Normal range is 5-29, but any level over 10 is considered suspect for insulin resistance.
Ideal is less than or equal to 5. Less than 10 is good.

First, we'll start with Anna K:

4 Anna K: A Patient Who Made Her Insulin Resistance Go Away

Anna K is a very pleasant if somewhat anxious woman in her mid-seventies who came to me because she was feeling tired. In our first visit I looked her over. We discussed the *Staying Healthy* handout (my eight page handout discussing nutrition), then I ordered some blood tests (*We'll round up the usual suspects*) for thyroid, chemistries, blood count,

[39] Shaper AG; Wannamethee SG; Walker M. Body weight: implications for the prevention of coronary heart disease, stroke, and diabetes mellitus in a cohort study of middle aged men. *BMJ* 1997 May 3;314(7090):1311-7.

cholesterol panel and scheduled her to see me again after trying the lifestyle changes we had discussed.

(a) *A Blood Sugar Of Two Hundred Eight Six!*

Her blood sugar came back alarmingly elevated at 286mg%, so I asked her to come back in sooner so we could discuss the possibility of the need for medication to help her keep her blood sugars normal. She was very resistant to the thought of taking medications. She finally agreed to take one metformin (the medication that lowers insulin resistance) in the morning. She said she was doing ok on the diet and in fact actually liked my fish stew recipe (the only patient who has ever admitted that).

She returned a few weeks later feeling much better, had lost a little weight, and was feeling very positive about where she was going with her health. Her laboratory studies are listed below:

TABLE 3-1.

	12/26/00	01/09/01	02/19/01	4/30/01	7/02/01	2/11/02
Glucose	286	100	98	96	99	108
Hemoglobin A1c	**13.0**	**10.6**	**7.4**	**6.0**	**5.7**	**5.6**
Weight	**140**	**133**	**132**	**132**	**130**	**127**

Her initial hemoglobin A1c (the 3-month average of her blood sugar) was even more alarming than initial blood sugar. A result above 7.4% is considered bad; levels above 8.4% are terrible, and above 10% you should just shoot either the doctor or the patient to get them out of their misery. Her A1c was 13.0mg%!

To give you an idea of how bad her A1c was- if your A1c rises from 6.4 to 7.4%, these is an increase in mortality (the rate of death) by 28%! The same is true from 7.4 to 8.4% and so on. Anna K's A1c of 13.0% suggested that her chance of dying over the next 5-7 years was very high.

(b) *Her Diabetes Went Away As Soon As She Changed Her Diet*

The A1c levels dropped to normal within 4 months, which is amazing because the test measures the amount of glycation of the hemoglobin in red blood cells. Since red blood cells last 120 days, it would take at least 3 months to get rid of the old glycated blood even if her blood sugars were normal. The fact that her A1c dropped so fast means that she made her diabetes go away almost as soon as she started the diet.

(c) *Her Cholesterol Went Up and Then Back Down*

Her LDL-cholesterol levels did give me some concern, however, because a patient with Diabetes is supposed to have an LDL of less than 100mg%. Initially she was ok, but then the higher fat diet (with eggs for breakfast) made her LDL shoot up. I wanted to start her on a cholesterol-lowering medication but she refused. Fortunately the next time we checked the LDL cholesterol it was falling back to normal.

Why did her LDL go up initially? Well, simply stated, your liver makes as much cholesterol as your body needs. This is usually tightly controlled, so as you eat more cholesterol your liver makes less cholesterol (unless you are genetically programmed to make a lot of cholesterol). Insulin is one of the hormones that prompts the liver to produce more triglycerides and cholesterol. If your insulin level is too high (obesity, pre-Diabetes, or Diabetes Type 2), your liver will continue to make excess cholesterol even in the face of eating a lot of cholesterol.

TABLE 3-2.

	12/26/00	01/09/01	02/19/01	4/30/01	7/02/01	2/11/02
Cholesterol	237	240	214	210	196	197
LDL	**135**	**162**	**153**	**133**	**121**	**120**
HDL	50	54	45	58	61	61
Triglycerides	210	121	80	94	68	81
Weight	**140**	**133**	**132**	**132**	**130**	**127**

(d) *Insulin Resistance Raises Your Cholesterol and Triglycerides*

When she first came to me, Anna appeared to have significant insulin resistance and elevated insulin level. Her liver was pouring out cholesterol, but since she had followed a low fat diet (rich in sugar and starch) her cholesterol was ok. But when she got rid of sugar and starch and added a lot of cholesterol to her diet, her liver initially continued to pump out cholesterol and her LDL went significantly up. As her insulin resistance resolved and her insulin level returned to normal, her cholesterol and LDL dropped again to normal.

(e) *A New Lifestyle*

Part of what made Anna successful was her ability to adapt to a new lifestyle. A little knowledge and encouragement went a long way. Her enthusiasm and increased sense of wellbeing and energy made her into a teacher as well, helping those around her by sharing her newfound knowledge and health with the people around her.

Anna healed her Diabetes. She asked me in February if I thought it would be ok if she had an ice cream cone in July! But when it finally got to July she said she would rather

feel good than eat it, so she didn't. She converted many of her employees to her new way of living and eating.

5 Gregory H: High Triglycerides and a Large Waist Equals Insulin Resistance

I had emailed Gregory the information on *Staying Healthy* and the *Diabetes Handout* even before he came to see me for the first time. He had recently developed diabetes and had started the Atkins' diet to try to make his diabetes go away.

(a) *Making Your Diabetes Go Away*

When I first saw him I did not order blood studies because we wanted his diabetes to go away before we documented he had anything close to diabetes. I do this for patients because life insurance companies do not believe that someone can make diabetes go away. As far as they are concerned once a diabetic, always a diabetic. But that is obviously not true. Patients can make their insulin resistance resolve with simple changes in their lifestyle. It is true that most American Indians and Australian Aborigines will develop Diabetes if they eat the American Diabetes Association diet, and it will resolve on their traditional hunter-gatherer diet.

Gregory did not want to take any medications at all, but I suggested he take the chromium and magnesium because these help reduce insulin resistance. Gregory's Lab studies are as follows (he is 6' 4" tall):

TABLE 3-3.

	11/16/01	01/07/02	03/04/02	06/05/02
Glucose	125	88	85	84
Hemoglobin A1c	**9.0**	**7.0**	**6.0**	**6.0**
Weight	**310**	**292**	**284**	**290**

Note that without any medication he has brought his diabetes test (Hemoglobin A1c) down to normal. Gregory has been very successful in reversing his insulin resistance and thereby is reducing his risk of aging and disease. The goal continues to get his weight lower and his A1c into the mid-normal range.

TABLE 3-4.

	11/16/01	01/07/02	03/04/02	06/05/02
Cholesterol	212	225	181	198
LDL	**113**	**162**	**117**	**126**
HDL	34	44	43	43
Triglycerides	326	96	103	146

On the high fat diet, Gregory's initial cholesterol went up while his triglycerides fell dramatically. His HDL (good) cholesterol had also improved. As he continued to follow the diet and improve his insulin resistance, his LDL also began to improve but not quite enough. At the June 2002 office visit I finally convinced him to take a cholesterol-lowering drug to protect him until we can get his body back into shape.

6 Mary M: Unbelievable reduction in LDL; the effect of caring for self

Her results are amazing. Again her cholesterol initially went up, but as she continued the diet, her weight and diabetes continued to get better. The reduction in LDL on 3/23/2000 from 213 to 120mg% was due mostly to following the diet (I had also added 10mg of Lipitor, which might have reduced the LDL 20-40mg% at most by itself). She lost inches, her mood improved, and she was making me (the Doctor) look good by her numbers. The *Mediterranean Hunter-Gatherer Diet* had worked wonders in her.

TABLE 3-5.

	8/13/98	1/6/00	3/23/00	3/22/01	9/26/01
Cholesterol	250	317	187	230	182
LDL	**150**	**213**	**120**	**133**	**103**
HDL	62	53	40	49	46
Triglycerides	189	254	134	239	164
Weight	**170**	**166**	**163**	**159**	**154**

Her diabetes test fell to normal in January and she has continued to do well on the low carbohydrate diet.

TABLE 3-6

	8/13/98	1/6/00	3/23/00	3/22/01	9/26/01
Glucose	127	83	84	89	91
Hemoglobin A1c	**7.5**	**6.0**	**6.0**	**6.4**	**6.1**
Weight	**170**	**166**	**163**	**159**	**154**

7 John T: The Effects of Excess Glycation

(a) *Lack of Care for Yourself*

Exhausted from doing too much for others? Are you unable to care for yourself? Do you find yourself reaching for sweets, starch, cigarettes or alcohol just to keep going? Must you complete your work, apparently no matter what the toll on your body?

- Smoking raises endorphins and adrenaline.
- So does eating chocolate and grains.
- So does drinking beer and wine (Terrific!).

I feel better already, or at least different and able to continue to slog on through what I was supposed to be doing.

- Rather than caring for myself.
- Rather than resting.
- Rather than saying: *Enough is enough*.
- Rather than saying: *That is gutenuf*.

There was a surgeon in Eden, NC who as he was finishing an operation putting in the last few sutures to close the skin (the patient was still asleep) would always say *Well, that's good enough for who it's for*. And it nearly always was.

Why can't the rest of us begin to take on that attitude? Do our best, then say out loud: *Well, that's good enough for who it's for*. Because it nearly always is.

(b) *The Development of Pre-diabetes*

So back to the story of John T. He worked for an advertising firm, doing too much for everyone and taking on more and more duties as the need arose. He began taking care of other's needs with nothing left for him. He ate junk food at work: Tastycakes, donuts, and bagels just to have the energy to keep going. Thank goodness he didn't smoke, or he would have done that too. But he didn't need to smoke. His borderline Diabetes was all he needed. His energy began to fail; he was anxious and achy most of the time. Accidents began happening, and then…

(c) *The Development of Heart Disease*

Chest pressure >> A very positive stress test >> Cardiac catheterization followed by the onset of unrelenting chest pain >> Emergency quadruple coronary artery bypass surgery. And that was only the beginning.

John did well through the heart operation and made it to cardiac rehabilitation. But then all hell broke loose. It was as if the dam had burst. His borderline Diabetes had evidently been silently working for years causing his tissues to become stiff and yellow.

(d) *The Development of Diabetes and All of the Complications*

He developed the following problems in fairly short order:

- Orthostatic hypotension causing his blood pressure to drop during exercise
- Small vessel coronary disease giving him angina (chest pains) despite adequate coronary artery blood flow

- Damage to the nerves of his stomach and bladder making them sluggish and slow to empty causing intractable nausea and stomach bloating
- Numbness of his hands and feet
- And last but never least
- Erectile dysfunction (i.e. No sex!)

John had had borderline blood sugars but never met the diagnostic criteria for diabetes until mid-2000. Most of his blood sugars had been normal and his Hemoglobin A1c levels had only been above 6.5% mg% one time (the average in this country for patients with Diabetes Type 2 is around 9 mg% -normal was 4.4-6.4 mg%).

TABLE 3-7

	05/05/00	08/02/00	11/17/00	3/22/01	3/27/02	08/21/02	6/05/03
Glucose	108	143	114	76	95	78	93
Hemoglobin A1c	6.6	7.6	6.4	6.1	5.6	5.5	5.2
Weight	220	216	214	204	180	174	168

(e) *The Incredible Impact of Self Care on Complications of Diabetes*

Up to this point, John had been a passive observer in most of his health care. I encouraged him to read *Protein Power* by Drs. Eades. He suddenly became the captain of his ship. He followed the low-carbohydrate diet to the letter. His weight dropped more than 40 pounds, his blood sugars normalized, his attitude and energy improved. He actively researched Diabetes and brought me information on many medications and supplements that he thought made sense and wanted to try. He was a new person. Well, sort of.

(f) *Making Your Diabetes Go Away, But Too Late?*

Now John's Hemoglobin A1c levels are in the low to mid-normal range (almost as good as mine). But in some ways this is the closing of the barn door after the horse had gone. John's health was like a heavily damaged B-52 bomber plummeting 12,000 feet toward earth, the pilot and crew fighting valiantly to save their ship. Finally, seemingly only inches above the ground, they get her to level off and fly her safely back to base. But the damage has been done.

(g) *Pre-Diabetes: The Warning Shot Across the Bow*

John's pre-Diabetes was like the warning shot across the bow of a ship. Either change direction or the next shot will be to the heart of the ship. One would like to change before you have to change. And to change before you are listing 15 degrees to starboard, and definitely before the call for abandon ship! Because that call goes up too soon as it is.

I assume if you are reading this book that you are concerned with how you feel and would like to feel better and continue to feel better. My goal is to practice medicine based not on fear of illness or death, but on self-love and self-acceptance. Gutenuf- translated *good enough*. Give yourself a break. The preceding story about John is scary, but it is not meant to put fear in our hearts. It is meant to put knowledge in our brains and strength in our souls.

(h) *So love, not fear*

But I also think it is important to understand the risks of our behaviors. What does it mean to have a 38-inch waist when you were a 30-inch waist at age 18 years old? Is your percent body fat too high? Can you pinch an inch? It does not matter if you are big or small. The next chapter will hopefully make this clear and inspire you to greater heights (and a smaller waist).

8 Eat A Diet Rich in the Healthy Oils from Nuts, Fish, Olive Oil and Other Healthy Fats

This, however, does not mean I have eliminated carbohydrates from my diet. The Mediterranean Hunter-Gatherer diet consists of green leafy vegetables and other low-glycemic vegetables and fruit, followed by monounsaturated fat in tree nuts and olive oil, and finally the fat and protein from nuts, eggs, fish, poultry and beef.

(a) *The Major Sources of Sugar and Starch to Avoid are as Follows:*

- Sugar, ice cream, yogurt, sorbet
- Corn syrup in sodas and syrup, baked goods and cereals
- Pasta, bread, pizza, rolls, pastries, cakes and cookies (anything made with flour)
- Root vegetables including potatoes, carrots, turnips, etc (a little is ok?)
- Rice (brown and white)- ok if you are training for a marathon (not most of us)

All of this will become perfectly clear as you see the many options of great foods in the Mediterranean Hunter-Gatherer Diet. But it is key to your success to understand the destructive effects of simple carbohydrates on your body and your sense of well being. My prediction is that as you see the reasons why bagels are death, you too will become convinced that not only do bagels promote fatigue of the body and mind, they also promote accelerated aging of your blood vessels and the rest of your body.

Eating Sugar is Death!

Eating Starch is Even Worse!

4

SUGAR AND STARCH

1 What Is Starch?

Starch is composed of glucose molecules loosely bound to each other. The digestion of starch begins at once, even in your mouth.

(a) *Try this Experiment:*

Place two bowls on a table. Place a Saltine cracker in one bowl and chew another cracker and spit the paste into the other bowl. Place a drop of iodine in each bowl. The un-chewed cracker will turn black signifying that it is starch. The chewed cracker will turn blue because it has been digested to sugar by the enzymes in your saliva. This is why we like crackers. Even sugar-free Cheerios turn to sugar in your mouth. Now eat the Special K breakfast. By the time this combination of grains, low fat milk, and orange juice gets into your small intestine you may as well have had a Coke or cake or just a cup of sugar for breakfast. Grains turn to sugar; low fat milk is mostly sugar; an orange juice is almost all sugar. You have probably already heard that a potato is equivalent to sixteen teaspoons of sugar. But potatoes are even worse than table sugar because at least the sucrose in table sugar must be absorbed and broken down from sucrose to glucose and fructose before it is free to circulate through the body as free glucose.

(b) *How about the Glycemic Index?*

The glycemic index is a measure of how much a food will raise your blood sugar. The higher the glycemic index of a food, the higher your blood sugar (and insulin release) will be. And since we are trying to keep our blood sugar and insulin levels as low as possible, it is important to avoid the higher glycemic foods and eat the lower glycemic foods.

But you must be careful using the index, because if you add margarine to a potato the glycemic index falls but the healthfulness does not improve. This is particularly true of potato chips, which can be referred to as potato *hips* because of their ability to grow your hips (and waist).

(c) *The Glycemic Index of Common Foods*[40]

The following are examples of the glycemic index of various foods using bread as the index of 100 (rather than sugar). Our individual responses may differ from these values so keep an open mind. Some patients with diabetes report that carrots do not raise their blood sugar nearly as much as bread or dry cereals.

Glycemic index (Bread=100)

White Rice	126	Soft drink	97	Oat Bran Bread	68
Baked Potato	121	Angel Food Cake	95	Orange	62
Corn Flakes	119	Sucrose	92	Apple Juice	58
Jelly Beans	114	Cheese Pizza	86	Pumpernickel	58
Cheerios	106	Spaghetti	83	Apple	52
Carrots	101	Popcorn	79	Skim Milk	46
White Bread	101	Orange Juice	74	Black Beans	42
Wheat Bread	99	Green Peas	69	Fructose	32

Note there is not much difference between white and wheat bread, although pumpernickel is significantly less. Rice and potatoes are the worst, followed closely by the cereals (including Special K by the way) and pasta. The oils would score close to zero. Most of the nuts score in the single digits or the teens, although cashews (and peanuts) are a little higher than the others are.

(d) *So How Does One Begin To Eat Correctly?*

The Seven-Day Plan for the Mediterranean Hunter-Gatherer diet gives you a lot of options-from simple to finer foods and preparation. Much of this came from the diets of very successful patients who weren't afraid to push the envelope of what could be considered breakfast or a snack.

- Breakfast is mandatory even if it is just a handful of nuts and a tablespoon of mint or lemon flavored cod liver oil (for the omega-3 oils to help reduce depression and heart disease).
- Avoid pasta, bread, potatoes, and rice.
- Avoid all foods made from flour (unless you are crossing a desert or in a famine).
- Find a snack you like-I love nuts. Consider: vegetables and dip such as guacamole or ranch dressing made with olive oil.
- Avoid all fat free dressings and dips; these are full of corn syrup. Even Blue cheese dressing is healthier unless you're sensitive to milk products.

[40] Foster-Powell K, Miller JB, International Tables of Glycemic Index. *Am J Clin Nutr* 1995;62:871.

- Unsweetened chocolate or 72% pure chocolate is my treat when I am feeling suicidal.
- Very moderate use of low carbohydrate alcoholic beverages appears to be healthful.
- Avoid all fruit juices! (Yes juices!) Sugar is sugar and fruit juices are all sugar.

(e) *So What Do You Drink? Water! Eight to Twelve Glasses Per Day!*

The rule about water is as follows:

- If you're tired, you are probably just thirsty, so drink water.
- If you're hungry, you are probably just thirsty, so drink water.
- If you're thirsty, it's too late! Your body is already dehydrated!

2 Getting Started On Living

Now stop. Visualize what we are trying to do. Sugar acts as molecular glue making our tissues stiff and yellow. Pasta, bread, potatoes and rice all rapidly convert to sugar. Eating sugar and starch causes more insulin to be released. Even whole grain bread!

This excess insulin acts as a growth factor for breast cancer, colon cancer, prostate cancer and pancreatic cancer. It also acts as a growth factor for atherosclerosis and has a growth factor for your belly, and we all know that a bigger belly promotes a higher insulin level and greater insulin resistance.

Therefore more insulin = more tumor growth, and more eating (oops-game over). So let's change directions.

(a) *So why does the Mediterranean Hunter-Gatherer Diet work?*

Having trouble eating right? You have to learn how to cheat and get away with it. On your diet, not your spouse!

- Do you like cashews? Then eat cashews (and almonds and walnuts and Brazil nuts and pecans).
- Do you like smoked salmon? Then eat it with a fork (with capers and onions I hope).
- Do you want a beer? Then have one, but move toward a light beer such as Amstel light or better yet a Miller light, which is lower in carbohydrates. So drink but no DUI! Michelob Ultra is even lower, but it is a wheat beer that may stimulate allergies in some people (like me).
- Do you like Italian sausage? Eat it with a knife and fork with or without some eggs. But try to get the organic Italian Turkey sausage if you can, but I'm not going to argue already!

You must have food that you like, just OBLITERATE all of those bagels and muffins and donuts and cookies and cakes and French fries and chips and spaghetti and fried rice and hot dog buns and … All are death. And chips make hips that can sink ships, so watch out!

Bagels	Spaghetti
Muffins	Fried rice
Donuts	Hot dog buns
Cookies	Biscuits
Cakes Rolls	Whole wheat bread
French-fries	Crackers
Chips	

Read the list through again and visualize the cell death and tumor growth that occurs as you consume these foods. Now avoid those foods. My sixteen-year-old daughter recently told me that I have single-handedly ruined bread for her. She cannot eat it in good conscience-she is experimenting with a lower carbohydrate diet (figuring how to cheat and get away with it in her diet).

Eating sugar is death. (But a little death is OK?)

Eating starch is just like eating sugar.

Like driving your car sixty miles per hour in first gear.
Like leaving a dozen roses in the sun with no water.
Like a slow motion version of pouring gas on your body and lighting a match.

(b) *Eating Fat and Cholesterol Does Not Make Your Cholesterol Go Up As Much As Eating Sugar*

Insulin stimulates the liver production of triglycerides and cholesterol. Insulin promotes the storage of fat in the lower stomach that supports a higher serum cholesterol level. If your insulin level is low, the more cholesterol you eat, the less cholesterol your liver makes, and vice versa. But if your insulin level is high, watch out. Your liver will continue to pour out cholesterol in addition to the cholesterol you eat. So get your insulin level down.

(c) *Avoiding The American Heart Association Prudent Diet (the Food Pyramid diet)*

When compared to the Mediterranean diet, the American Heart Association prudent diet was associated with three times the cardiac death and six times the cancer rate.[41] The effect was so significant that the researchers felt it was unethical to continue the trial because of the much higher death rate in the low fat, high starch Heart Association diet.

The Lyon Trial

Arch Intern Med 1998 Jun 8;158(11):1181-1187.

Mediterranean dietary pattern in a randomized trial: prolonged survival and possible reduced cancer rate.

de Lorgeril M, Salen P, Martin JL, Monjaud I, Boucher P, Mamelle N.
Laboratoire de Physiologie and GIP-Exercice, Centre Hospitalo-Universitaire de Saint-Etienne and School of Medicine, France.

BACKGROUND: The Mediterranean dietary pattern is thought to reduce the risk of cancer in addition to being cardioprotective. However, no trial has been conducted so far to prove this belief.

METHODS: We compared overall survival and newly diagnosed cancer rate among 605 patients with coronary heart disease randomized in the Lyon Diet Heart Study and following either a cardioprotective Mediterranean-type diet or a control diet close to the step 1 American Heart Association prudent diet.

RESULTS: During a follow-up of 4 years, there were a total of 38 deaths (24 in controls vs 14 in the experimental group), including 25 cardiac deaths (19 vs 6) and 7 cancer deaths (4 vs 3), and 24 cancers (17 vs 7). Exclusion of early cancer diagnoses (within the first 24 months after entry into the trial) left a total of 14 cancers (12 vs 2).

After adjustment for age, sex, smoking, leukocyte count, cholesterol level, and aspirin use, the reduction of risk in experimental subjects compared with control subjects was 56% (P=.03) for total deaths, 61% (P=.05) for cancers, and 56% (P=.01) for the combination of deaths and cancers. The intakes of fruits, vegetables, and cereals were significantly higher in experimental subjects, providing larger amounts of fiber and vitamin C (P<.05). The intakes of cholesterol and saturated and polyunsaturated fats were lower and those of oleic acid and omega-3 fatty acids were higher (P<.001) in experimental subjects. Plasma levels of vitamins C and E (P<.05) and omega-3 fatty acids (P<.001), measured 2 months after randomization, were higher and those of omega-6 fatty acids were lower (P<.001) in experimental subjects.

CONCLUSIONS: This randomized trial suggests that patients following a cardioprotective Mediterranean diet have a prolonged survival and may also be protected against cancer. Further studies are warranted to confirm the data and to explore the role of the different lipids and fatty acids in this protection.

[41] de Lorgeril M, Salen P, Martin JL, Monjaud I, Boucher P, Mamelle N. Mediterranean dietary pattern in a randomized trial: prolonged survival and possible reduced cancer rate. *Arch Intern Med* 1998 Jun 8;158(11):1181-1187.

(d) *Sure the Modern Mediterranean Diet is Better, But Don't Eat It.*

Why? Because you don't work in the fields all day, ride your bike everywhere, and you have money and access to better foods. Poor people must survive on foods that are inexpensive and accessible. Hence the dependence on pasta, breads, potatoes and milk products. Whereas these foods were the main foods available 100 years ago without the benefit of refrigeration or the trucking industry, now all of us have access to the best foods. So what are the best foods?

3 The Best Foods: The Mediterranean Hunter-Gatherer Approach

So what is this Mediterranean Hunter-Gatherer Diet anyway? My example to patients is as follows: Ok, let's say we need to cross the desert or the prairies (as many of our ancestors spent their time doing). You need to travel light and carry as many calories with as little weight as possible.

(a) *Crossing the desert*

- If you are crossing the desert, don't take broccoli!

One pound of brocolli=100 calories
One pound of bread = 1100 calories
One pound of spaghetti = 2100 calories

- If you eat a pound of broccoli you get a little over 100 calories (because broccoli is mostly water and fiber), although half of the calories in broccoli do come from plant protein. Half of the carbohydrates are fiber and broccoli does reduce prostate cancer (although this is probably not a big concern in the desert).
- If I were crossing the desert I would take bread. Ready to eat, a pound of bread provides about 1,100 calories with approximately 20% from protein and a little fiber; not bad considering the circumstances.
- Spaghetti would be an even more efficient food to carry because one pound of uncooked spaghetti provides over 2,000 calories, but only about 15% from protein and very little fiber. But spaghetti must be cooked and requires water to do so, a valuable commodity in the desert.
- Lentils are high in fiber and provide about 1,000 calories per pound with 25% from protein but must be soaked and cooked, which would again slow us down.

(b) ***But, we are not crossing the desert!***

So why do we choose our food this way as if we were still crossing the desert! We have ready access to all of the best foods that promote health and prevent disease, and yet we eat as though we live in the damn dessert. It does not make sense!

The cultivation of grains allowed ancient civilizations to organize into larger communities, to store and transport food to cities distant from agricultural centers, and to stockpile food to avoid famine. These grains provided valuable calories but were a poor natural substitute for the previous wide variety of foods humans consumed as hunter-gatherers.

In the 1850's it was known that a diet rich in fresh vegetables and meat was the ideal diet for a patient with diabetes, but it was felt to be unworkable because of the lack of availability (and the expense) of these foods in northern cities. This was due to the lack of refrigeration and an efficient transport system.

This is no longer true yet we continue to subsist on the foods of famine that have almost unlimited shelf life and very limited nutritional value.

French gastronome Jean Anthelme Brillat-Savarin in 1825 published in *The Physiology of Taste* that he could easily identify the cause of obesity after 30 years of listening to one stout party after another proclaiming the joys of bread, rice and (from a particularly stout party) potatoes.

He described the roots of obesity as a natural predisposition to consume potatoes, grain or any kind of flour.

It appears he may have gotten it right.

Taubes G. NYTimes July 7, 2002

5

THE MEDITERRANEAN HUNTER-GATHERER DIET

1 Redefining Good Things to Eat

Now we need to re-orient our brains into accepting the fact that consuming the healthy oils in our foods is actually good for us. It is true that there are 9 calories per gram of fat and only 4 calories per gram of carbohydrates and proteins. But my experience (*and studies have shown*) that if you eliminate the starches and sugars and consume more fat you will lose weight, AS LONG AS THE CALORIES ARE ALSO REDUCED. But since fat makes you satisfied, you don't need to keep eating. My suggestion is to try the Mediterranean Hunter-Gatherer Diet and see how you feel. Most people feel terrific and lose weight (*also suggested by studies of diets of similar content presented below*).

(a) *The Lots of Oil Diet*

- Monounsaturated fat in olive oil and almonds help to reduce LDL (bad cholesterol) and raise HDL (good cholesterol).[42] I try to consume 1-2 cups of olive oil and at least a pound of almonds and/or walnuts per week. If you are going to eat a little bread, dip it in olive oil with spices as do the people in the Mediterranean. This slows the absorption of the starch and reduces insulin response. Canola oil is OK, but not as natural as olive.
- Omega-3 oils in fatty fish (tuna, mackerel, sardines, salmon, and herring) appear to reduce both heart disease and cancer.[43] Tuna is not quite as healthy because it is lower in good fat and higher in mercury (because it is higher on the food chain, and therefore accumulates toxins). The flaxseed oil has recently been associated with increase prostate cancer, so it might be good to avoid.

(b) *My goal for a balanced diet*

- Consume 5-15% of calories from permitted vegetables and berries (*the lesser amount if you are trying to lose weight*).

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[42] Gumbiner B, Low CC, Reaven PD. Effects of a monounsaturated fatty acid-enriched hypocaloric diet on cardiovascular risk factors in obese patients with type 2 diabetes. *Diabetes Care* 1998 Jan; 21(1):9-15.

[43] de Lorgeril M, Salen P, Martin JL, Monjaud I, Boucher P, Mamelle N. Mediterranean dietary pattern in a randomized trial: prolonged survival and possible reduced cancer rate. *Arch Intern Med* 1998 Jun 8;158(11):1181-1187.

- A goal of 50 to 70% of calories from monounsaturated fat (*olive oil, walnuts and almonds*) and omega-3 oils in fish (*lots of liquid, healthy fat, please*).
- 15-30% of calories from protein with an emphasis on fatty fish and lean meat and poultry.
- Given the high fiber and water content of the green leafy vegetables, the diet by grams of food will contain a lot of vegetables, a lot of nuts with the moderate amounts of oils and meat, fish, eggs and poultry. Berries are acceptable but the other fruits are limited.

2 Rules of Thumb for Eating

(a) *Eating fat makes you satisfied*

The hormone CCK that holds the food in your stomach (*making you feel full*) and tells your brain that you are satisfied is released from the first part of the small intestine in response to FAT. If you do not eat fat, you will rarely feel full or satisfied. It takes 20 minutes for CCK to be released and to get to your brain. No matter how much you eat, you will not feel satisfied for 20 minutes. Don't eat so much so quickly.

(b) *Shop the perimeter of the grocery store; if something will not rot or sprout, don't eat it.*

(c) *Chew each bite at least twenty times*

The food needs to be in small pieces for the body to extract the nutrients.

(d) *Do not wash your food down with water*

Drinking lots of water while you eat dilutes the enzymes that help your body absorb nutrients. Cold water is the worst because the enzymes are much less effective at lower temperatures because they are designed to function at body temperature (approximately 98.6 degrees). But a glass or two during meals is probably ok, particularly if you are trying to lose weight).

(e) *Don't eat pasta, bread, potatoes, or rice*

(f) *Eat more low-glycemic vegetables and some fruit (see below for how to do this)*

(g) *Eat some protein and good fat with every meal and snack (almonds and walnuts are an excellent choice)*

(h) *How About the Drinking of Alcohol?*

Non-sweetened alcoholic beverages appear to reduce blood sugar and insulin levels and reduce heart disease. Alcohol appears to be metabolized as liquid fat, not as sugar (as is seen when a person with diabetes consumes alcohol; their blood falls rather than rising). But not recommended for everyone due to the ever-present risk of alcoholism. Limit to 14/week for men, 9/week for women. See more on Alcohol in Chapter Fourteen.

3 Evidence for the rich in oil Mediterranean Hunter-Gatherer Diet

(a) *You can lose weight and improve your health eating 50-70% of your calories as fat*

James Hays MD[44] did a study which included 187 patients with Diabetes type 2 (84 men, 73 women). During the first year the subjects ate the American Diabetes Association diet. The second year they followed a higher fat diet. The ADA diet had 1800 calories with 30% fat, 50% carbohydrate and 20% protein. The high fat diet was 1800 calories with 50% fat, 20% carbohydrate and 30% protein (fat 90% saturated, 10% monounsaturated similar to the Atkin's diet).

Results: Average weight loss: 40 pounds; LDL: 133 fell to 105; HDL: 44 rose to 47; Triglycerides: 229 declined to 182; 90% of patients achieved ADA targets for HbA1c, HDL, LDL, and triglycerides.

(b) *A high fat meal raises your insulin level less than a high protein meal*

TK Nordt and colleagues demonstrated that insulin levels increased after the protein-rich meal but decreased after a fat-rich meal.[45] The article was entitled *Influence of breakfasts with different nutrient contents on glucose, c peptide, insulin, glucagon, triglycerides, and GIP in NIDDM*. The study groups ate three different breakfasts varying in the amount of fat and protein (group 1) or only in fat (group 2).

(c) *Polycystic Ovary Syndrome improves on a 50% fat diet*

Polycystic Ovary Syndrome (PCOS) appears to be mediated by insulin resistance. Hays did a study demonstrating that significant weight loss was associated with lower fasting insulin/glucose ratios and lower serum triglycerides.[46] Three of 8 women desiring pregnancy became pregnant; 3 of 4 women reported mild to moderate subjective

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[44] Hays J. A higher fat diet promoted improvement in all parameters of Diabetes control. *Abstract presented at the Endocrine Society 82nd Annual Meeting,* May 2000.

[45] Nordt TK; Besenthal I; Eggstein M; Jakober B. Influence of breakfasts with different nutrient contents on glucose, C peptide, insulin, glucagon, triglycerides, and GIP in non-insulin-dependent diabetics. *Am J Clin Nutr* 1991 Jan;53(1):155-60.

[46] Hays J. Carbohydrate Restricted High-Fat Non-Ketotic Diet Improves Polycystic Ovary Syndrome. *Abstract presented at the Endocrine Society 82nd Annual Meeting*. May 2000.

improvement of excess facial hair; 7 of 8 women reported return of regular menstrual periods. The diet used was again 50% fat, 20% carbohydrates and 30% protein.

(d) ***If you cannot afford beans, then eat bread!***

DJ Jenkins showed that bread gives a much higher glycemic response than beans.[47] *(But if you can afford low starch vegetables, olive oil, fish, meat, nuts and berries, eat them.)*

(e) ***It appears prudent to avoid the use of the ADA diet (low-fat, high-carbohydrate diets containing moderate amounts of sucrose) in patients with Type 2 diabetes.***

Coulston described the deleterious metabolic effects of high-carbohydrate, sucrose containing diets in patients with non-insulin dependent diabetes mellitus (this was the recommended ADA diet).[48] Two test diets consumed in random order over 15 days each: ADA diet containing 20% protein, 20% fat, and 60% carbohydrate with 10% of calories as sucrose; the higher fat diet containing 20% protein, 40% fat, and 40% carbohydrate with 3% of calories as sucrose.

Incremental glucose and insulin responses from 8am to 4pm were significantly higher with the ADA diet and 24 hour urine glucose excretion was significantly higher (*55 versus 26grams/24hr*) with the ADA diet. HDL concentrations dropped with the ADA diet *(HDL is the good cholesterol, so the lower level was worse for the patient).* LDL concentrations did not change on either diet.

(f) ***Eating almonds, walnuts, cashews, pecans (and even peanuts?) appears to protect against heart attacks***

Sabate stated that perhaps one of the most unexpected and novel findings in nutritional epidemiology in the past 5 years has been that nut consumption seems to protect against heart attacks. In a large, prospective epidemiologic study of Seventh-day Adventists in California, Sabete found that the frequency of nut consumption had a substantial and highly significant inverse association with risk of heart attacks and death.

[47] Jenkins DJ: Glycemic Responses to Food in non-insulin dependent diabetes *Am J Clin Nutr* 1984 Nov;40(5):971-81.
[48] *Am J Med* 1987 Feb;82(2):213-20.

(g) ***Eating nuts is associated with increased longevity***

The Iowa Women's Health Study and other studies[49] also documented an association between nut consumption and decreased risk of IHD. The protective effect of nuts on IHD has been found in men and women and in the elderly. Importantly, nuts have similar associations in both vegetarians and non-vegetarians. The protective effect of nut consumption on IHD is not offset by increased mortality from other causes. Moreover, frequency of nut consumption has been found to be inversely related to all-cause mortality in several population groups such as whites, blacks, and the elderly. Conclusion: Nut consumption may not only offer protection against IHD, but also increase longevity.

4 What to Eat

So you want to know exactly what to eat. The following is a partial list of foods. Chapter Seven will give a more complete presentation of suggestions and recipes to help you get started. If I were truly smart, I would move to the south of France or the north of Italy where all of the best foods flourish in the perfect weather.

(a) ***Vegetables***

(1) Best: broccoli, cauliflower, Brussel sprouts, artichokes, celery, leeks, asparagus, endive, rhubarb, parsley, garlic and other spices, greens of collard, mustard, kale, cabbage, kohlrabi and lettuce, okra, Dandelion greens, escarole, horseradish, seaweed, Swiss chard, etc.

(2) *Acceptable*: carrots, onions, spinach (very high in oxalates), mushrooms, turnips.

(3) *Limit:* Brown rice, Yams.

(4) Avoid: Baked potatoes, potato chips, mashed potatoes, pretzels and all wheat products.

(b) ***Oils***

(1) Best: Olive oil-extra virgin, olive oil-light, tree nut oils (almond, walnut), grape seed oil, fish oils.

(2) Acceptable: butter, high oleic safflower oil.

(3) Limit: Canola oil (too processed?), peanut oil.

(4) Avoid: Soybean oil, corn oil, partially hydrogenated oils.

[49] Hu FB; Stampfer MJ Nut consumption and risk of coronary heart disease: a review of epidemiologic evidence. *Curr Atheroscler Rep* 1999 Nov;1(3):204-9.

(c) ***Meats*** *(All range fed without hormones or antibiotics).*

(1) Best: Eggs and meat from chickens raised without hormones or antibiotics, turkey, organic beef, range-fed or wild venison, duck, buffalo, goose, rabbit, moose, elk.

(2) Acceptable: Conventionally raised turkey (they tend to die if raised with too many hormones and antibiotics).

(3) Limit: Conventionally raised (mass produced using hormones and antibiotics) poultry, eggs, beef, etc.

*(4) Avoid**:*** Conventionally raised pork.

(d) ***Fish*** *(Most fish are excellent sources of protein and omega-3 oils).*

(1) Best: Salmon, sardines, bass, trout, squid, whitefish.

(2) Acceptable: These fish are higher in mercury and other toxins so avoid the dark meat tuna, swordfish, especially for children and women of childbearing age.

(3) Limit: These are scavengers and may be contaminated with pathogenic bacteria so choose carefully. Oysters, clams, mussels, and lobster.

(4) Avoid: Certain fish are endangered and should be allowed to recover. Orange Roughie, Striped Bass.

(e) ***Nuts and seeds***

(1) Best: almonds, walnuts, Brazil, pecans, macadamia, acorns, hickory, filberts, sesame, coriander, celery, anise, caraway, cumin, dill, fennel, mustard, pumpkin, and any others edible raw.

(2) Acceptable: cashews (I usually buy roasted/salted cashew pieces because they already are not that good for you, and mix them in with the unroasted nuts), pistachios, sunflower seeds.

(3) Limit: peanuts, soy nuts (actually beans).

(f) ***Fruits (Avoid all but the "Best" while you are trying to lose weight)***

(1) Best: cucumbers, avocados, olives, zucchini, tomatoes, etc.

(2) Acceptable: apples, apricots, cherries, papaya, pineapple, plums.

(3) Limit: bananas, watermelon, cantaloupe, oranges, lemons, limes, tangerines, pears, peaches, melons, plums, prunes, dates, mango (unless you are allergic).

(4) Avoid: all commercial fruit juices.

(g) ***Berries***

(1) Best: organic blueberries, raspberries, blackberries, strawberries are best, but wash them carefully. These are lower in sugar and higher in fiber.

(2) Acceptable: conventional blueberries, raspberries, blackberries, and strawberries, but again wash them carefully due to the pesticides.

(3) Limit: currants, grapes and all dried fruit that are higher in sugar.

Note: People with arthritis may want to avoid the nightshade vegetables to see if it improves their arthritis: tomatoes, peppers, eggplant, and potatoes.

5 What not to eat: The Foods of Famine

These are the foods that can be stored for long periods of time and are referred to as the products of civilization. They allowed us to gather in communities and survive living in climates with a short growing season. But although they provide calories, they are very short in important nutrients that prevent illness and optimize health. So avoid them when you can.

(If you can not eat it raw, then don't eat it.)
If even mold or bacteria won't eat it, then you don't eat it either.

(a) ***Grains*** *(See Chapter Thirteen- What's Wrong with Wheat)*

(1) Worst: all grains, especially corn and wheat that also promote allergies.

(2) Acceptable: rolled oats and rice are usually ok, but I still try to get my calories from vegetables, nuts and healthy oils. Non-wheat beers are ok unless you have Gluten-sensitive enteropathy (Celiac Sprue).

(b) ***Potatoes and other root vegetables***

(1) Worst: all varieties of potato turn rapidly to sugar in your body so avoid them. Especially bad are all French fries and potato chips that contain cancer-forming chemicals.

(2) Acceptable: Small amounts of yams, garlic, onions, beets, turnips, etc. are ok but still not as good as the green leafy vegetables.

(c) ***Dairy*** ***(See Chapter Twelve- Reasons to Avoid Cow's Milk)***

(1) Worst: all cows' milk, cheese, yogurt, whey, casein, and all products made with them.

(2) Acceptable: goat's milk and cheese (Feta cheese) and sheep milk products. The protein in cow's milk is the problem, so the use of a little butter or heavy cream is ok (very low in casein).

(d) ***Sugar***

(1) Worst: fructose, sucrose, maltose, dextrose, lactose, corn syrup and sweeteners, molasses, and all products made from them. This includes processed *fruit juices* (these are mostly sugar; you may as well have a Coke with a vitamin C tablet).

(2) Acceptable: a Tsp. of sugar in your coffee or tea will not kill you (only 4-5 grams of sugar). In comparison, a 12-ounce soda has 8 Tsp. of sugar (equivalent to a medium-sized potato!).

(e) ***Bad oils and fat***

(1) Worst: The omega 6 oils (corn, safflower, sunflower, Crisco, soybean and vegetable oil) may promote cancer and should be avoided, as well as the partially hydrogenated vegetable oils.

(2) Acceptable: a little peanut oil (as in Chinese food) is ok, as is the high oleic safflower and sunflower oils.

(f) ***Beans***

(1) Worst: Pinto and Navy contain lignans that may promote an abnormal immune response. Lima, wax, fava beans, and all products made from them (see section of The Other Side of Soy).

(2) Acceptable: You may include some hard beans (like black beans, etc.) which have a much lower glycemic index compared to the others. Peas, peanuts, and pure chocolate (cocoa butter has been associated with reduced heart disease) are also ok in limited amounts unless you are allergic.

The Most Common Mistakes

1. Eating too much fruit- especially the high sugar fruits like bananas, apples, melons, and citrus.
2. Drinking fruit juices like orange juice- these are full of sugar!
3. Having cereal with low fat milk for breakfast- this is all simple carbohydrates. You can get your fiber and calcium in healthier forms.
4. Eating too many nuts. Measure the amount of nuts to put in your baggy for snacks. You can have 1-2 oz if you are trying to lose weight or 3-5 oz if you are maintaining your weight.
5. Not drinking enough water- leading to constipation. Your body will steal the water it needs from the colon to run the body, leaving you constipated.
6. Not taking the Magnesium, chromium, and MSM (see Chapter 10 on nutritional supplements)- leading to constipation. Most of my patients have 1-3 bowel movements per day. If you are not, take Magnesium 500mg 1-2 tabs twice daily, MSM 3,000 mg in the morning and chromium picolinate 500 mcg in the morning. And drink your 8 glasses of water per day minimum.
7. Cheating too much- see next page.

The Ways I Cheat *(and frequently!)*

1. Decaffeinated coffee/ or 100% pure cocoa (sometimes real coffee as well)
2. 73% or (better) 99% pure chocolate bars (baker's chocolate-unless you are allergic!)
3. Roasted and salted cashews in with my unroasted unsalted mixed nuts
4. Miller Lite 1-3 per day
5. I do much of my exercise/weight lifting/stretching lying down
6. Feta goat cheese is usually fine (goat's milk does not cause as much allergic reaction)
7. I eat sausage (usually the organic Italian turkey sausage from the organic food market)
8. I eat bacon (usually organic turkey bacon from the organic foods market)
9. I eat poached eggs or sunny side up (exposing the egg yolk to heat and oxygen oxidizes the cholesterol- such as happens when you scramble eggs!)
10. If you are good 95% of the time, a little cheating doesn't seem to catch up with you, but it is a slippery slope to failure if you stray to wheat or milk products.

If your belt is getting tight, you are cheating too much- Retreat!

6

GETTING READY FOR THE FIRST WEEK

Don't think fat grams! Don't think calories!

Think:
What is this food doing to my blood sugar and insulin level? !

1 Nutrition for Women *(Men, Add Fifty Percent Please)*

If you eat something that is mostly sugar or starch, your blood sugar will rise rapidly requiring a much higher insulin level. This excess insulin promotes weight gain, diabetes, heart disease, cancer, depression, (not to mention fatigue and cravings) and early death The excess sugar acts like molecular glue (glycation) turning your organs yellow and hard (the hallmarks of aging).

But if you are going to be successful reducing sugar and starch, you will not only need to change your attitude but also your environment. You must surround yourself with foods you enjoy which are lower in sugar and you must add more healthy oils to satisfy your appetite and cravings. Some of these food suggestions may seem crazy but they appear to work well in clinical practice (and life). So here goes.

(a) *Getting Ready*

Giving up sugar and starch is similar to quitting smoking. I've heard you do it not because you really want to, but because you don't feel terrific or your children are making fun of you. It is never easy to quit consuming a substance. But then you discover you feel better (and free from the craving noose around your neck). After a while you decide you would never go back. You cheat and you find out you don't feel as well. You just feel off. These reactions confirm that the changes you made are working.

You will need to clean house of temptations including all baked goods, ice cream, and anything not listed that may pull you off your path. It is similar to putting away

ashtrays and other cues for smoking. This approach is designed to offer you satisfaction with little forethought and effort on your part. Just have some nuts or open the refrigerator to find something you like (that is also good for you). You will also need to busy yourself with other activities besides eating- such as exercise!

I suggest you try a couple of the supplements. The only ones that make you feel better are the chromium (better mood) and MSM (less aches and pains of getting older). The omega-3 oils in fatty fish do reduce cardiac arrhythmias (extra beats of the heart) and also makes me a nicer person (I now apologize to my wife after I am mean to her; well, most of the time). All of the others just fill in the blanks of our diets and I consider very optional if you are eating well.

I have included grocery lists of foods and supplements to purchase before starting. This will include two different approaches- the *Price is no object for health* approach and the *More cost-effective* approach. We will start with the *Price is no object* approach.

I suggest shopping for the produce and meat/fish on Sunday so you will be ready for the week. You will buy produce for one week and nuts and vitamins for one month, so the costs shown will average out over that time-span.

You will need to visit the following stores:

(1) Your local nut store (or online)
(2) Your local vitamin store (or online)
(3) Your local organic food store for organic produce, fruits, and meat/fish/poultry
(4) Your local grocery for less expensive staples

(b) *Buying Fresh versus Frozen*

I agree with those who say eating fresh food is better (ideally vegetables from your garden, eggs from your chickens, fish caught from your boat, and meat that you hunted), but my wife won't let me have chickens. You lose nutrients when you store, freeze, or dry food (you also lose nutrients when you cook foods, so nothing is perfect). If I have the time I prefer growing or buying fresh food.

Freezing or storing food does decrease the nutritional content by half or more (give or take). So I eat twice (or more) as many green leafy things (especially if they have been frozen). And this is easy to do because the vegetables are already cut-up and placed in handy bags or boxes in my freezer. It is mighty convenient to open the freezer, take out a bag of good frozen vegetables and heat them in a little water. Then remove from heat and add some olive oil and garlic. This is, of course, after you have defrosted the fish, chicken, or meat and broiled/sautéed/stewed/ baked it for a quick available dinner. Sometimes I

make frozen Brussel sprouts and assorted greens heated in olive oil with garlic and pepper for a quick snack (or with Tamari sauce or soy sauce).

2 The Money is No Object Approach

Ideally we would go (on a daily basis) to the local fresh market and buy fresh fish, broccoli, salad greens, red peppers, zucchini, and fruit and eat as much raw as possible. Prepare with lots of olive oil to encourage the absorption of fat-soluble nutrients. But life is full of compromises (I still by frozen berries and frozen leafy vegetables).

So let's go shopping… Shopping lists

(a) *The Nut Store*

Nuts for the First Month: (and each month thereafter)

Your local nut house or online; (buy in bulk, it is usually cheaper). I buy six pounds of each (with two of us eating, except Brazil nuts). Try to find organic nuts if you can.

(1)	3 lbs. unsalted raw almonds	11.50
(2)	3 lbs. unsalted raw walnuts	12.00
(3)	3 lbs. salted cashew pieces (roasted)	9.75
(4)	3 lbs. raw Brazil nuts	8.25
(5)	1 lb. raw macadamia nuts (optional, 9.99)	
	Total:	40.50
	(74.00 for two people)	

(b) *The Vitamin Store*

Supplements for Three Months:

(1)	Chromium polynicotinate 200mcg, (1/day)	10.00	
(2)	Magnesium citrate 250mg, 90 caps (1-2/day)	5.00	
(3)	Calcium 500mg with Vitamin D (1-2/day)	10.00	
(4)	MSM 1000mg, 150 caps (3/day)	30.00	
(5)	One Daily without iron (1/day)	12.00	
(6)	Cod liver oil, 16 oz (1 Tbs./day)	12.00	(buy fresh each month)
	Total:	79.50	

(c) ***The Local Grocery Store for the Basics***

Daily Staples: (approximately one-month supply, or more)

(1)	Olive oil- light, full bodied,	12.00	(for cooking)
(2)	Olive oil- extra virgin,	20.00	(for dressings)
(3)	Rice vinegar (don't worry; it's good)	3.00	
(4)	Garlic cloves (3 cloves)	2.00	
(5)	Dried Basil (or from the garden?)	2.00	
(6)	Dried Parsley (or from the garden?)	2.00	
(7)	Dried Fennel (or from the garden?)	3.00	
(8)	Ginger powder	3.00	
(9)	Red and black pepper	1.00	
(10)	Morton's Lite Salt	2.00	
(11)	Cans of tuna (albacore) five cans	7.50	
(12)	Cans of salmon (small cans) three cans	4.50	
	Total:	62.00	

(d) ***The Kitchen Store***

(1) Garlic press (fresh pressed garlic has anti-viral, anti-bacterial, and anti-fungal activity, as well as boosting the immune system)
(2) Stainless steel pots and pans with lids (no aluminum, please)
(3) Colander
(4) Egg poacher (usually holds three eggs)
(5) Egg coddlers- usually porcelain from Great Britain (optional)
(6) A blender
(7) A food scale (to quickly measure your nuts and other items)
(8) Measuring spoons

(e) ***The Kitchen Garden***

If you have any sunny area in your yard or neighborhood (most people won't steal what you are going to plant), you can grow the following vegetables and spices with almost no work on your part. You can plant seedlings from your local nursery in the spring. Many of these will winter over in states below NY. The mulch I use is the bags of leaves neighbors leave by the street. I grind the leaves with my lawn mower to make mulch.

(1) Kale (grows like a weed with no care- just mulch well so you don't have to weed)

(2) Collards (same as kale, may grow these together. The tender new leaves are good eaten raw)
(3) Arugula (a somewhat bitter green that grows well; again, mulch well)
(4) Parsley and Italian parsley
(5) Fennel (tastes like licorice, even my son likes it)
(6) Basil (will not survive frost- harvest before first frost. You can make pesto and freeze it, or dry by hanging in the kitchen, then place in dry container)
(7) Broccoli
(8) Brussel sprouts

Frozen Pesto:

Harvest your basil plants prior to the first frost. Collect the leaves, wash well and place in blender with ½ cup of olive oil per 2 packed cups of leaves. Blend until smooth. Add 1 Tbs. of Parmesan cheese and 1/3 cup almonds for each ½ cup of olive oil you have added. Blend until smooth and then decant into ice cube trays and freeze overnight. In the morning, remove pesto from trays and place in a freezer bag. You will now have pesto for the winter.

(f) ***The Organic Food Market***

Vegetables and fruit: Shop frequently so perishables will stay fresh
(I often buy frozen because they keep longer, for those of us who get to the store infrequently)
(Fresh is not really fresh; it has usually been sitting around for days or weeks?)

(1)	Soy sauce (no sugar or preservatives)	3.00
(2)	Grape seed oil mayonnaise	3.50
(3)	Spinach, fresh or frozen, 16 oz	1.75
(4)	Turnip greens, fresh or frozen, 16 oz	1.50
(5)	Broccoli flowerets, fresh or frozen, 16 oz	1.75
(6)	Brussel sprouts, fresh or frozen, 16 oz	2.25
(7)	Fresh asparagus, 1 bundle	3.00
(8)	Celery, 1 head	2.00
(9)	Carrots, small, bag, 8 oz	1.50
(10)	Strawberries, fresh or frozen, 16 oz	2.30
(11)	Blueberries, fresh or frozen, 16 oz	2.80
(12)	Raspberries, fresh or frozen, 16 oz	3.00
	Total	28.00

Meat/Poultry/Fish

(1) Haddock fillets, 16 oz		8.00
(2) Turkey bacon, 12 oz		4.00 (optional)
(3) Smoked salmon-no nitrites, 4 oz		5.00
(4) Cold water shrimp (frozen), 12 oz		6.00
(5) Scallops (frozen), 6 oz		4.00
(6) Crabmeat (canned), 6 oz		3.00
(7) Chicken breast, 8 oz		3.00
(8) Organic beef, 6 oz	3.00	
	Total:	36.00

3. Give Us This Day Our Daily Fish And Vegetables

We are now ready to begin. In the following chapter are suggestions for three meals, a snack and a dessert. Eat as much as you feel good eating. The snacks are there if you get hungry after eating your salads, etc. But the snacks are not required.

(a) *Breakfast, however, is required.*

Even if it is just the tablespoon of mint-flavored cod liver oil, the supplements, and a few nuts. If you do not eat in the morning (breaks your overnight fast), your body will assume there is inadequate food available and will slow your metabolic rate. This slower metabolic rate makes it much harder to lose weight and can make you feel sluggish and less like exercising. But your breakfast must have some healthy fat and protein as listed below.

(b) *Eating oil and fat makes you satisfied.*

If you are hungry during the day (or night), eat a little healthy fat (like nuts or nut-butter) and then go for a walk (to give the food time to work). Add olive oil to all vegetables to improve absorption of fat-soluble nutrients. Fat causes your intestine to release cholecystekinin (the hormone that tells your brain you have eaten). You will not feel satisfied after eating, NO MATTER HOW MUCH YOU EAT, until you eat some fat. The cholecystekinin takes 15-20 minutes to work so be patient and eat slowly.

(c) *Coffee is ok, but green tea is better?*

Caffeine is ok as long as you do not have heartburn, esophageal reflux, palpitations, or breast cysts. Caffeine increases frequency of bowel movements and

therefore probably reduces colon cancer, and coffee makes you think faster (but not smarter?). On the downside, coffee does leech calcium from your bones and raise your insulin levels, so don't overdo. I try to drink decaffeinated coffee most of the time (3% caffeine as opposed to the 7% caffeine of regular coffee). Is this similar to drinking light beer?

(d) ***What about Alcohol?***

Alcohol has been shown to reduce blood sugar and insulin levels (these are both good things) and is associated with a higher HDL (good) cholesterol. The alcohol appears to be metabolized as liquid fat and so does not raise your blood sugar but can actually lower blood sugar and insulin levels. People with diabetes will need to reduce or stop their insulin or other diabetes medication if they take a drink. Alcohol in excess (see below) is associated with liver disease (fatty liver and cirrhosis), heart disease (irregular beats of the heart), brain disease (depression, dementia, and neuropathy) and social ills (auto accidents, poor inter-personal relationships, and alcoholism). Avoid alcohol if you have any of the alcohol-related problems or hepatitis C. See chapter fourteen for more details about alcohol consumption.

Those who do not drink alcohol do not need to start drinking alcohol.

The Definition of Moderate Drinking

These are limits, not goals please!

Women: 1-2/day, max 9/wk.

Men: 1-3/day, max 14/wk

(e) ***Nutritional Supplements***

(1) Chromium polynicotinate 200mcg	1 in the morning
(2) MSM 1000mg	3-4 in the morning
(3) Magnesium citrate 250mg	1-2 per day
(4) Calcium citrate 500mg with vit D	1-2 per day
(5) Cod liver oil	1 Tbs. in the morning

Optional

(1) (Coenzyme Q-10 75mg)	1 in the morning
(2) (Alpha Lipoic Acid 300mg)	1 in the morning

(f) ***The Eating Suggestions***

You will find the nutritional content of the food you are eating listed. This is provided to give you an idea of what you are doing, not so that you can obsess over numbers of calories or fat grams. You will also find that many of your calories are coming from the healthy oils. Although oils are very rich foods (nine calories per gram versus four calories for protein and carbohydrate), avoiding the starches and sugars allow you to consume such high-caloric foods as nuts and avocados without gaining weight.

(g) ***Fiber does not count as usable carbohydrates***

It is not that dietary fiber is not important. It is key to try to consume at least 20 grams of fiber per day as well as drinking your eight to twelve glasses of water per day to keep your bowels regular. But it is true that fiber does not count in terms of raising your insulin level. In fact, you must subtract the fiber grams from the total carbohydrate grams to get the usable carbohydrates. As you will see….

(h) ***The Seven Day Plan For Women Is Different From The Seven Day Plan For Men***

One of my patients observed that if 50% of my patients had a particular issue I would write something to address it. And yet, she complained the original 7-day plan was written specifically for men. I admitted I had based the diet on how I eat, and since I am a man it closely resembles how a man can eat to feel good and lose weight. But in order for women to lose weight, they need to consume fewer calories than men as outlined in nutrition for women.

7

THE MEDITERRANEAN HUNTER-GATHERER
NUTRITION FOR WOMEN
SEVEN DAY PLAN

Better Known As:

The Sexy Long-Life Eating Plan

The Seven Day Plan
Is
A Life Long Eating Plan

(Not just for 7 days!)

1 A High Oil Diet Reduces Appetite, Muscle Loss, and the Markers of Aging

So we have discussed how eating fat and oils releases cholecystekinin, a hormone which suppresses appetite. A high oil diet also does the following:

- Promotes ketosis, which suppresses appetite
- Ketones are an excellent source of energy for muscles and the brain (see Chapter 11 Ultimate Sports Nutrition)
- Ketones reduce oxidative stress and slow aging
- Ketones improve Co-enzyme Q-10 levels which is associated with less Alzheimer's disease
- It is important to continue the ketosis from an overnight fast by minimizing carbohydrates for breakfast

(a) *Therefore, Eating Sugar is Death.*

And eating starch is even worse. Especially if you consume sugar and starch for breakfast. Try to save your carbohydrates for the evening hours, which will help induce

restful sleep without adversely affecting daytime energy consumption or insulin release. Who cares if you get hungry while you sleep, as long as you don't wake up!

(b) *Ketosis Appears To Be A Good Thing*

The hunter-gatherer probably spent much of his or her life in ketosis while hunting and gathering for food. Is this the Atkins' diet? No and yes. Dr. Atkins' diet is a ketogenic diet but includes foods that are known to be unhealthy. This includes the nitrites and other preservatives in cured meats, as well as the hormones and antibiotics often used in the production of conventional meat, poultry and farm-raised fish. In addition, the over-consumption of certain vegetable oils (high in Omega-6 oils) may promote the growth of tumors.

2 Nutrition for Women: The New Seven-Day Plan

(a) *Weight Loss Diet for Women (Men add 50% more food per serving)*

Why is this called Nutrition for Women? Because the first plan I created was based on how my successful patients (all men) and I had eaten. But my female patients complained that they were not losing weight nearly as fast (this is also true of the Atkins' Diet that contains too many calories for women). The original plan I set forward was based on 1800 calories per day and no women (except athletes) will lose weight eating that much. So I was requested to create a plan specifically for women. Men need only to eat half again as much (50% more) than their female counterpart.

(1) Calories:1000-1200 Calories per day
(2) Fat: 60-70%; 80-100 grams per day (720-900 calories)
(3) Carbohydrate: 7-10%; 20-30 grams per day (80-120 calories)
(4) Protein: 20-30%; 60-90 grams per day (240-360 calories)

Men: Increase each serving size by ½ (50% more) and you will still lose weight. Examples include the following:

Eggs: have 2 or 3 instead of 1 or 2 (one whole egg and one egg white if cholesterol is high)
Meat, fish, and poultry: 3 ounces instead of 2 for breakfast
6 ounces instead of 4 for lunch
9 ounces instead of 6 for dinner

(b) *Maintenance Diet For Women*

(1) Calories: 1500-1800 Calories per day
(2) Fat: 50-60%; 80-100 grams per day (720-900 calories)
(3) Carbohydrate: 15-20%; 50-75 grams per day (200-300 calories)
(4) Protein: 15-25%; 60-90 grams per day (240-360 calories)
(5) Women may increase most serving sizes by 50%
(6) Men may increase some serving sizes of their choice by 100%
(7) Both should add some fruit and more vegetables; but keep the digestible carbohydrates (total minus fiber) to less than 30 grams (for women) and 40 grams (for men).

3 Guidelines for Healthy Eating

(a) *Best is Better Than Better, Which is Better Than Good*

You may mix and match from each column (Best, Better and Good) on the following pages (see the tables below and this will become clearer). An example is choosing the salmon for breakfast but having real coffee instead of the Organic Italian turkey sausage with green tea (I usually choose the decaf if I have the option although I like green tea also). Brewed decaf coffee has 40% of the caffeine of regular coffee, so if you get the large you come out even.

(b) *Buy Good Foods*

Try to buy all organic meats and poultry and wild (not farm raised) fish. Do not eat farm-raised salmon; look for wild salmon at your organic food market. Tuna, swordfish and other large predator fish have higher levels of mercury and other toxins. The white Albacore tuna is better because most of the toxins are concentrated in the darker fatty part of the fish (less in the white part of the fish).

(c) *Eat Some Nuts*

Put the nuts (your snack) into a baggie to carry with you in case you get hungry (being prepared prevents failures). There is always a donut shop nearby (I call this Donut Death) so be prepared to eat in a healthy way. Most of the nuts I eat are unroasted and unsalted; but I like roasted and salted macadamias and cashews as a treat (but cashews are much higher in simple carbohydrates).

(d) *Balance Your Omega 6 and Omega 3 oils*

When you begin to eat a lot more oils and fats, it is important to make sure you are not consuming too much of the omega 6 oils. These are present in the vegetable oils and in nuts. This is why I encourage you to eat the fatty fish, including the salmon, herring, sardines and mackerel. The cod liver oils are also excellent sources of omega 3 oils. Some other options include the grape seed oil mayonnaise (Vegennaise), which tastes a lot like real mayonnaise but without the soybean oil. Using butter or olive oil increases the monounsaturated fats and avoids the polyunsaturated fats.

(e) *Worrying About Cholesterol*

If you have diabetes or high cholesterol based on a family trait of excess cholesterol production, I suggest you avoid excess dietary cholesterol (eggs, sardines, shrimp, lobster, and fatty steak). The kippered herring is ok, as are the whites of eggs (only the yolk contains cholesterol).

4 The Seven Day Plan For Women

Over the next seven pages you will find suggestions for eating including a breakdown of each meal's nutritional content. The three columns are designed so you may choose what appeals to you the most. If you do not see something you like, go to the next page. There are twenty-one different options for each meal over the seven days to choose from. Hopefully you will find foods that are appealing.

(a) *Nutritional Content*

The nutritional breakdown is recorded as follows:

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

(b) *Goals for the Seven Day Plan*

(1) Try to keep your fiber intake at 10 grams per day or more
(2) Drink your eight to twelve glasses of water per day to prevent constipation
(3) Avoid carbohydrates early in the day to help maintain ketosis and lean body mass
(4) You may add some fruit in the evening after supper (unless you are trying to lose weight)
(5) Keep the ratio of omega-6 to omega-3 at 2:1 or better if possible
(6) Experiment with new foods and new recipes (see recipes which follow)

Nutrition for Women

(Men, eat 50% more please)

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carb - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Monday	**Best**	**Better**	**Good**
Breakfast	Smoked wild salmon (2 oz) (130/9/11/0/1-5/30) Eaten with a fork 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	2 poached eggs with (140/9/12/2-0-2/3-0/426) 2 strips organic turkey bacon (40/1/6/0/0-0/20) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Hot organic Italian turkey sausage (one link-4 oz) (160/6/26/4-2-2/2-0/70) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Salmon salad (½ cup) (288/21/21/3-2-1/4-3/62)	Tuna salad (½ cup) (205/12/22/0/3-2/37)	Chicken salad (½ cup) (206/18/31/5-2-3/4-0/70)
Snacks	30 almonds (1 oz) (180/16/7/7-4-3/4-0/0) Green tea	16 macadamia nuts (1 oz) (220/20/3/3-2-1/4-0/0) Decaf coffee	15 whole cashews (1 oz) (180/15/4/9-1-7/4-0/0) Coffee
Dinner	Filet Mignon (6 oz) (or other lean steak) with sautéed onion (338/27/48/6-2-4/3-0/130) Greens with garlic and olive oil (or other fat) (140/7/5/5-5-1/0-0/0)	Sautéed Flounder (8 oz) (320/13/38/6-2-4/1-2/100) Salad with 1 Tbs. Dressing (205/14/4/16-4-12/2-0/0)	Chicken stir fry (6 oz) (360/13/54/6-2-4/5-0/120) California style broccoli (175/11/9/12-6-6/3-0/0)

Monday	**Best**	**Better**	**Good**
Dessert Or snack	Strawberry Smoothie (140/9/6/13-7-6/2-3/0)	Strawberry Smoothie (140/9/6/13-7-6/2-3/0)	Strawberry Smoothie (140/9/6/13-7-6/2-3/0)
Calories Fat Protein CHO Fiber Net "carbs" O-6/O-3 Cholesterol	1285 calories 98 gm (882 cal- 68%) 88 gm (352 cal- 28%) 32 gm 20 gm 12 gm (48 calories- 4%) 14 gm/16 gm (1:1) 222 mg	1167 calories 79 gm (711 cal- 61%) 89 gm (356 cal- 30%) 42 gm 17 gm 25gm (100 calories-9%) 12 gm/12gm (1:1) 585 mg	1297 calories 77 gm (693 cal- 54%) 124 gm (496 cal- 38%) 47 gm 20 gm 27 gm (108 calories- 6%) 20 gm/ 8gm (2.5:1) 260 mg

CHO = carbohydrates

Please substitute from the Best, Better or Good columns; look to see what appeals to you most.

If you like coffee, drink it with and after your smoked salmon and tablespoon of cod liver oil.

If you like to drink a lot of coffee, drink brewed decaffeinated coffee (water extracted). It has 40% of the caffeine of regular coffee.

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Tuesday	**Best**	**Better**	**Good**
Breakfast	Leftover steak 2 oz (113/9/16/2-0-1/1-0/40) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	Almond butter 2 Tbs. (180/16/7/7-4-2/4-0/0) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	2 soft-boiled eggs (140/9/12/2-0-2/3-0/426) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Bristling Sardines in 2 layers 1 can (150/10/14/0/1-5/48)	4 oz sliced turkey rolled up w/ lettuce & spicy mustard (150/2/35/0/1-0/66)	4 oz sliced roast beef rolled up w/ lettuce & spicy mustard (230/9/34/0/2-0/90)
Snacks	30 almonds (1 oz) (180/16/7/7-4-2/4-0/0) Green tea	1 oz unsweetened chocolate (140/14/4/4-2-2/2-0) Decaf coffee	1 oz 70% chocolate (136/10/3/12-2-10/2-0/0) Coffee
Dinner	Salmon in dill sauce 6 oz (270/17/27/0/3-9/93) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Broiled lamb 6 oz (344/16/46/0/2-0/155) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Crustless crab and broccoli quiche (136/8/12/4-2-2/1-1/228) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)

Tuesday	Best	Better	Good
Dessert Or bedtime snack	Blueberry Smoothie (157/9/6/18-8-10/2-3/0)	Blueberry Smoothie (157/9/6/18-8-10/2-3/0)	Blueberry Smoothie (157/9/6/18-8-10/2-3/0)
Calories Fat Protein CHO Fiber Net "carbs" O-6/O-3 Cholesterol	1038 calories 80 gm (720 calories- 69%) 66 gm (264 calories- 25%) 30 gm 16 gm 14 gm (56 calories- 5%) 13/21 (2:3) 181 mg	1004 calories 76 gm (684 cal- 68%) 94 gm (376 cal- 37%) 29 gm 16 gm 13 gm (52 calories- 5%) 13/8 (3:2) 221 mg	962 calories 64 gm (576 cal- 61%) 63 gm (252 cal- 27% 36 gm 14 gm 22 gm (88 calories- 10%) 12/9 (4:3) 744 mg

Balancing your fats: You must take an Omega-3 oil supplement (cod liver oil) to balance the ratio of omega-6 and omega-3 oils. Too much omega-6 oil appears to promote cancer growth.

If you are sick or over 70 years old, use the cod liver oil. The ALA in flax oil must be metabolized to EPA and DHA (the fish oils) which becomes less efficient with disease or older age.

Some people feel flax oil may increase prostate cancer in men; therefore it may be prudent to avoid the flax and take the cod liver oil instead.

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Wednesday	Best	Better	Good
Breakfast	2 eggs poached or coddled (140/9/12/2-0-2/3-0/426) with 2 oz of leftover salmon (90/6/9/0/2-6/31) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	Fish sausage 4 oz (160/9/26/1-0-1/3-1/68) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	4 oz organic turkey Kielbasa (118/6/18/2-0-2/0-0/28) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Kippers 1can (165/12/11/0/2-9/50)	Curried Tuna salad (½ cup) (205/13/22/0/3-2/37)	Leftover Quiche (1/4 of pie) (136/8/12/4-2-2/1-1/213)
Snacks	8 Brazil nuts (1 oz) (190/19/4/3-2-1/7-0/0) Green tea	14 pecan halves (1 oz) (200/20/3/4-2-2/9-0/0) Decaf coffee	14 walnut halves (1 oz) (180/17/4/3-2-1/11-0) Coffee
Dinner	Flounder fillet with shrimp (285/10/46/3-2-1/2-1/162) Sautéed Zucchini w/ garlic (83/7/2/4-2-2/1-0) Salad with 2 Tbs. olive oil & rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Steak with onions 6 oz (338/27/48/6-2-4/3-0/150) Sautéed Zucchini (83/7/2/4-2-2/1-0/0)	Shrimp 4 oz with pesto (568/35/42/3-2-1/5-2/260) 8 asparagus stalks w/ lemon (60/0/6/12-4-8/0)

Wednesday	Best	Better	Good
Dessert Or bedtime snack	¼ cup blueberries (40/0/1/10-3-7/0)	¼ cup blueberries (40/0/1/10-3-7/0)	¼ cup blueberries (40/0/1/10-3-7/0)
Calories Fat Protein Carbohydrate Fiber Net “carbs” O-6/O-3 Cholesterol	1293 calories 91 gm (819 calories-63%) 87 gm (348 calories-27%) 28 gm 11 gm 17 gm (68 calories-5%) 21/32 669 mg	1259 calories 87 gm (783 cal - 62%) 102 gm (408 cal - 33%) 28 gm 11 gm 17 gm (68 cal - 5%) 20/10 257 mg	1136 calories 80 gm (720 cal-63%) 83 gm (332 cal-29%) 34 gm 13 gm 21 gm (84 cal-8%) 19/11 501 mg

Leave out dessert while you are losing weight.

The berries are much lower in carbohydrates and higher in fiber and antioxidants than other sweeter fruit from trees.

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Thursday	Best	Better	Good
Breakfast	2 eggs "over easy" with (140/9/12/2-0-2/3-0/426) 2 strips organic turkey bacon (40/1/6/0/0-0/20) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Kippers 2 oz. in wine sauce (152/8/10/4-0-4/0-3/38) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Kippers 2 oz. in cream sauce (152/8/10/4-0-4/0-3/38) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Mixed green salad with hard-boiled egg and (103/5/8/8-2-6/1-0/213) 2 Tbs. Ranch dressing (193/20/0/2-0-2/2-0/21)	Leftover steak (2 oz) and zucchini (113/9/19/2-1-2/1-0/50)	Leftover shrimp pesto (2 oz) (184/12/14/1-0-0/2-1/84)
Snacks	14 pecan halves (1 oz) (200/20/3/4-2-2/9-0/0) Green tea	1 oz unsweetened chocolate (140/14/4/4-2-2/2-0/0) Decaf coffee	1 oz 70% chocolate (136/10/3/12-2-10/2-0/0) Coffee
Dinner	Flounder Creole (340/19/30/12-2-10/2-5/100) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Shrimp and scallop stew (407/17/48/12-3-9/2-3/285) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Italian pot roast (600/46/60/12-5-7/0-0/180) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)

Thursday	Best	Better	Good
Dessert Or bedtime snack	Fresh Berries with Heavy Cream and Brandy (116/5/2/15-6-9/0/15)	Fresh Berries with Heavy Cream and Brandy (116/5/2/15-6-9/0/15)	Fresh Berries with Heavy Cream and Brandy (116/5/2/15-6-9/0/15)
Calories Fat gms Protein gms Carb gms Fiber gms Net carbs O-6/O-3 Cholesterol	1392 Calories 112 gm (1008 cal- 72%) 63 gm (252 cal- 18%) 47 gm 14 gm 33 gm (132 cal- 10%) 19/13 795 mg	1173 Calories 81 gm (729 cal-62%) 81 gm (324 cal-28%) 44 gm 14 gm 30 gm (120 cal-10%) 6/14 388 mg	1461 Calories 109 gm (981 cal-67%) 91 gm (364 cal-25%) 44 gm 15gm 29 gm (116 cal-8%) 6/12 317 mg

I still have some concerns about consuming too much saturated fat. We all have small vessel disease (little tiny strokes) when we do MRI scanning (a special type of picture of the brain) after age 50 years or so. Dr. Swank has shown that you can mimic these small strokes by injecting particles the size of saturated fat into animals.

If you are going to add alcohol to the diet, make sure you add in those carbohydrates. You will probably need to reduce some other carbohydrate, such as the berries or vegetables like zucchini or eggplant.

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Friday	**Best**	**Better**	**Good**
Breakfast	Smoked wild salmon (2 oz) (130/9/11/0/1-5/30) w/ sliced onion 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	Omelet w/ lox and sautéed onions (298/24/17/0/3-3/462) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Organic ham and cheese omelet (376/30/28/0/3-0/487) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Brisling sardines in 2 layers packed in olive oil, 1 can (156/10/48/0/1-5/48) 8 oz water	Tamari tuna salad (½ cup) (205/13/22/0/3-2/37) 8 oz water	Curried chicken salad (206/18/31/5-2-3/4-0/70) (½ cup) 8 oz water
Snacks	14 walnut halves (1 oz) (180/17/4/3-2-1/11-0/0) Green tea	8 Brazil nuts (1 oz) (190/19/4/3-2-1/7-0/0) Decaf coffee	14 pecan halves (1 oz) (200/20/3/4-2-2/9-0/0) Coffee
Dinner	Renaissance Greek Salad (anchovies optional) (600/50/18/20-6-14/2-0/44)	Irish chicken dinner (378/18/41/11-6-5/4-0/120)	Irish lamb soup (470/26/44/9-5-4/2-0/135)
Dessert Or bedtime snack	8 fresh strawberries (25/0/1/5-2-3/0/0)	8 fresh strawberries (25/0/1/5-2-3/0/0)	8 fresh strawberries (25/0/1/5-2-3/0/0)

Friday	Best	Better	Good
Calories	1300 calories	1168 calories	1340 calories
Fat gms	100 gm (900 cal-69%)	88 gm 792 cal-68%)	96 gm (864 calories-65%)
Protein gms	82 gm (328 cal-25%)	85 gm (340 cal-29%)	107 gm (428 cal-32%)
Carb gms	28 gm	19 gm	23 gm
Fiber gms	10 gm	10 gm	11 gm
Net carbs	18 gm (72 calories-6%)	9 gm (36 calories-3%)	12 gm (48 calories-3%)
O-6/O-3	17/18	19/13	18/8
Cholesterol	122 mg	619 mg	692 mg

Women will need to eat 1200 to 1300 calories per day to lose weight consistently. Men can eat 1800 to 2000 and often still lose weight.

If you are exercising, you can certainly increase your calories. I would not suggest just increasing your carbohydrates, but try to maintain these ratios of fat/carbohydrate/protein.

Eat more fruit if you would like to gain a little weight. The fruit trees bear fruit in the fall to fatten us up for the long cold winter. But now the grocery stores are open year-round and our houses have heat (although our children claim I never actually turn it on).

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Saturday	Best	Better	Good
Breakfast	The Japanese Breakfast (400/21/18/8-2-6/5-7/243) Green tea	Goat Cheese omelet (336/28/23/0/3-0/469) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Oat waffles (339/23/10/22-2-20/0/160) w/ strawberries & cream 78/6/1/11-4-7/0-0/21) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	The Japanese Lunch (130/9/11/0-0-0/1-5/30) 8 oz water	Leftover Irish chicken dinner (1/2 serving) (189/9/20/5-3-2/2-0/60)	Leftover Irish lamb soup (1/2 serving) (300/20/22/5-2-3/1-0/68)
Snacks	Mixed nuts 2 oz 360/32/14/14-8-6/8-2/0) Green tea	1 oz unsweetened chocolate (140/14/4/4-2-2/2-0/0) Decaf coffee	1 oz 70% chocolate (136/10/3/12-2-10/2-0/0) Coffee
Dinner	The Japanese Dinner (430/30/29/8-2-6/6-12/60) Glass of dry white wine (85/0/0/3-0-3/0-0/0)	Baked chicken w/ basil (319/14/44/8-2-6/5-0/226) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Mexican chicken salad (296/17/25/13-5-8/1-0/80) Black-eyed peas with garlic and kale (226/14/12/22-9-13/2-0/0)

Saturday	Best	Better	Good
Dessert Or bedtime snack	1 Kiwi, sliced (46/0/1/11-3-8/0/0)	½ cup blueberries fresh or frozen (42/0/1/10-3-7/0/0)	½ cup raspberries fresh or frozen 1 Tbs. heavy cream (88/6/1/9-4-5/0/21)
Calories Fat gms Protein gms Carb gms Fiber gms Net carbs O-6/O-3 Cholesterol	1220 calories 92 gm (828 calories-68%) 72 gm (288 calories-24%) 41 gm 15 gm 26 gm (104 calories-9%) 13/25 349 mg	1297 calories 93 gm (837 cal-65%) 94 gm (376 cal-29%) 33 gm 12 gm 21 gm (84 calories-6%) 16/8 755 mg	1514 calories 110 gm (990 cal-65%) 76 gm (304 cal-20%) 83 gm 28 gm 55 gm (220 calories-15%) 8/8 350 mg

The waffles are on the edge of acceptable, but I admit I do make them for the kids. Instead of syrup they use whipped cream (out of a can!). But life is full of compromises.

But if you go to one of those $15 buffet brunches with all of the wonderful fish and Eggs Benedict, don't eat the darn waffles. The fish and other great foods are worth much more to your body (and their pocketbook).

I hate to admit it but I always think the less informed are choosing the waffles and pastries instead of the salmon, mackerel, herring and fancy breakfast meats.

Nutrition for Women (Men, eat 50% more please)

Nutritional Content

Calories / Fat / Protein / Total Carbs - Fiber - Net Carbs / Omega 6 - Omega 3 / Cholesterol

Sunday	**Best**	**Better**	**Good**
Breakfast	Low Carb Waffles with Blueberries and cream (258/11/22/6-3-2/5-1/104) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	2 eggs poached (140/9/12/2-0-2/3-0/426) w/ 2 Tbs. salsa 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Western omelet (262/21/14/4-1-3/2-1/556) 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Salmon cakes (260/22/18/3-2-1/6-5/50) Steamed greens of choice (140/7/5/5-5-1/0-0/0)	Crab cakes (190/11/9/3-2-1/0-2/50) Steamed greens of choice (140/7/5/5-5-1/0-0/0)	Shrimp salad (220/11/24/4-2-2/5-1/173)
Snacks	16 macadamia nuts (1 oz) (220/20/3/3-2-1/4-0/0) Green tea	14 walnut halves (1 oz) (180/17/4/3-2-1/11-0/0) Decaf coffee	15 whole cashews (1 oz) (180/15/4/9-1-7/4-0/0) Coffee
Dinner	Curried Chicken Salad with Grapes and Celery (287/14/25/14-2-12/4-1/85) Salad with 2 Tbs. olive oil & rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Herbed Lamb Chops w/ asparagus (506/30/46/13-5-8/0-0/155) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)	Beef and mushroom stew (293/17/18/10-2-7/0-0/125) Salad with 2 Tbs. olive oil / rice vinegar dressing (170/14/2/6-2-4/2-0/0)

Sunday	**Best**	**Better**	**Good**
Dessert Or bedtime snack	8 fresh strawberries (25/0/1/5-2-3/0/0)	½ cup blueberries fresh or frozen (42/0/1/10-3-7/0/0)	½ cup mixed berries fresh or frozen 1 Tbs. heavy cream (88/6/1/9-4-5/0/21)
Calories Fat gms Protein gms Carb gms Fiber gms Net carbs O-6/O-3 Cholesterol	1129 calories 81 gm (729 calories-65%) 76 gm (304 calories-26%) 42 gm 18 gm 24 gm (96 calories-9%) 23/15 239 gm	1153 calories 85 gm (765 cal-66%) 74 gm (296 cal-26%) 42 gm 19 gm 23 gm (92 calories-8%) 16/10 631 gm	1254 calories 98 gm (882 calories-%) 63 gm (252 calories-%) 42 gm 12 gm 30 gm (120 calories-%) 20/10 875 gm

Delicious and Healthy

Coming up!

Recipes for Monday

Breakfast

Smoked salmon Serves 1 (130/9/11/0/1-5/16)
2 oz of wild smoked salmon (not farm-raised)

You will be paying a high price ($10-$30/lb.) but it is worth it. The farming of salmon is damaging our coastal environments. The salmon are fed fish food (similar to dog food?) with food dyes and antibiotics to prevent infections in the dense populations in the pens. We owe it to the environment and ourselves to choose appropriately.

Two poached eggs Serves 1 (140/9/12/2-0-2/3-0/426) **with 2 strips organic turkey bacon** (40/1/6/0/0-0/20)

2 eggs
A sliver of butter or dash of olive oil
2 strips of turkey bacon
Salt and pepper to taste
2 dashes of beef bouillon powder (no MSG)
Dash of soy sauce or hot sauce is optional

Put a little water into a small pot and place egg poacher tray in pot and turn heat on high. Drop the butter or olive oil in poacher and wait for butter to melt. Carefully break the egg into the poacher. Bring to boil, cover and reduce heat and cook for 4 minutes (runny egg) to 6 minutes (medium egg). Meanwhile, cook the bacon in a separate pan. Or you could grab 2 ounces of sausage from the refrigerator (approximately 2 inches of a large sausage link). Slide the eggs into a warm bowl and enjoy. A dash of soy, hot sauce or the beef bouillon powder is a nice variation.

Hot organic Italian turkey sausage (160/6/26/4-2-2/2-0/70)
4 oz (one link) of organic Italian turkey sausage
1 Tsp. butter or olive oil

On Sunday evening while making dinner, cook 3-4 links (one package) of organic Turkey sausage. Heat the sausage and butter/oil in a heavy skillet at medium-high heat. Cook until the sausage is brown, turning frequently (8-10 minutes). Cover skillet and let "coast" for another10-15 minutes. Remove from heat, cut into bite-size pieces and place in a container in the refrigerator to enjoy for breakfasts or snacks during the week.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Lunch

Salmon salad Serves 2 with ½ cup each (288/21/21/3-2-1/4-3/60)

7.5 oz can of salmon-boneless
2 Tbs. Grape seed oil mayonnaise
2 celery stalks, finely chopped
Salt and pepper to taste
Optional: 1 Tbs. Chopped onion

Mix all ingredients together. May serve with mixed green salad.

Helen of Troy salad of tuna Serves 1 (228/11/31/3-2-1/3-1/37)

6 oz can of solid white tuna, drained
1 Tbs. grape seed oil mayonnaise
½ Tsp. Fresh dill or ¼ Tsp. dried dill
1 celery stalk, finely chopped
Salt and pepper to taste
Optional: 1 Tbs. Chopped onion

Mix all ingredients together. May serve with mixed green salad.

Call me Ishmael's chicken/turkey salad (Serves 2 with ½ cup each) (206/18/31/5-2-3/4-0/80)

½ lb. boiled chicken or turkey breast
1 Tbs. grape seed oil mayonnaise
1 Tbs. organic heavy cream
½ Tbs. seasoned rice vinegar
1 Tsp. lemon juice
2 celery stalks- finely chopped
Salt and pepper to taste
Optional: 1 Tbs. Chopped onion

Mix all ingredients together. May serve with mixed green salad.

Snacks

Almonds (1 oz is 30 unroasted nuts) (180/16/7/7-4-3/4-0/0)

Almonds are high in fiber and monounsaturated fat. One to two ounces of almonds for snacking is appropriate if you are trying to lose weight. Three to five ounces is acceptable if you are maintaining your weight.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Macadamia nuts (1 oz is 16 nuts) (220/20/3/3-2-1/4-0/0)

Macadamia nuts are the lowest nuts in carbohydrate content, although they do not have as much fiber as almonds. But I love them (usually roasted and salted unfortunately). But avoid the salt if your ankles swell.

Cashews (1 oz is 15 whole nuts or 30 half nuts) (180/15/4/9-2-7/4-0/0)

Cashews are much higher in carbohydrates and lower in monounsaturated fat. But you may add them to your mixed nuts for some variety and richness of flavor. Do not overdo these if you are trying to lose weight.

Dinner

Filet mignon (or other lean steak) with sautéed onions (1 dinner / 1 breakfast) (338/27/48/6-2-4/3-0/130)

8 oz filet mignon
1 medium onion, sliced
½ pound mushrooms, sliced
1 Tbs. organic butter
Salt and pepper to taste

Heat heavy skillet until hot. Add butter, mushrooms and onion and sauté until limp (1-2 minutes). Add filet and sear the first side until brown (1-2 minutes). Turn and sear second side as the first. Cover and turn off heat. Let sit for 3-5 minutes. The steak will be rare or medium rare, depending on the thickness. You may cook longer if you desire.

Sautéed flounder Serves 2 (320/13/38/6-2-4/1-2/100)

1 lb. Flounder fillet
1 medium onion, sliced
2 Tbs. Fresh parsley, chopped finely
1 Tbs. Organic butter or olive oil
¼ Tsp. red pepper
Salt to taste
Dash of soy sauce

Heat heavy skillet until hot. Add butter and onion, reduce heat and sauté until limp (1-2 minutes). Add fillet and cook the first side until fish is no longer translucent (3-4 minutes). Turn and cook second side as the first. Cover and turn off heat. Let sit for 3-5 minutes. The fish will be easy to pull apart with a fork when done.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Chicken stir-fry Serves 2 (360/13/54/6-2-4/5-0/120)

12 oz Chicken breast cut into 1/2-inch-wide strips
1 Tbs. olive oil
1 medium onion, sliced
1 clove garlic, minced
1 Tsp. curry powder
½ Tsp. salt
½ Tsp. dried thyme
1/8 Tsp. ground red pepper
2 Tbs. chopped fresh parsley

Add olive oil and chicken to skillet. Stir-fry over medium-high heat for 3 minutes or until lightly browned. Add onion and garlic; stir-fry 3 minutes or until tender. Add curry powder and next 4 ingredients; stir well. Reduce heat. Simmer for 10-15 minutes or until tender. Spoon into bowls and sprinkle with parsley.

Vegetables

Greens with garlic and olive oil or other fat Serves 2 (140/7/5/5-5-1/0-0/0)

1 Tbs. olive oil or organic butter
16-oz package frozen Kale (or 3 cups fresh, chopped)
(Or may try collards, turnip or mustard greens)
1 Tbs. water
Freshly ground pepper to taste
1 large cloves garlic, crushed in press

Heat the water, kale (or other greens) and garlic in a large skillet over medium-high heat stirring until they are wilted. Simmer until the greens are tender, about 5 minutes, stirring occasionally; season to taste with salt and pepper. Remove from heat, add olive oil and stir to mix. Serve immediately.

California style broccoli with grape seed oil mayonnaise Serves 2 (175/11/9/12-6-6/3-0/0)

1 lb. Broccoli (12 spears)
2 Tbs. Grape seed oil mayonnaise

Steam broccoli for 3-5 minutes. Serve immediately with topping of mayonnaise.

Salad Serves 4 (65/0/4/14-4-10/0-0/0)

12 oz red leaf lettuce or mixed greens (8 cups)
1 medium cucumber, sliced

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Nobel Prize winning vinaigrette Serves 2 (140/14/0/2-0-2/2-0/0)

2 Tbs. olive oil
2 Tbs. Rice vinegar
2 fresh basil leaves; chopped or 1 Tsp. dried basil
½ dried tarragon
½ Tsp. Dried mustard
¼ Tsp. Sea salt
Ground pepper to taste

Salad with dressing (205/14/4/16-4-12/2-0) No nitrites or other preservatives in the turkey or roast beef

Dessert

Strawberry smoothie Serves 2 (140/9/6/13-7-6/2-3/0)

1 cup frozen strawberries
15 almonds
1 cup filtered water
½ Tsp. vanilla
(1 pack of Stevia)

Place the nuts in the blender and blend until chopped into fine pieces. Add the water and blend on high, adding the strawberries one at a time. Blend for 2-3 minutes or until thick. Pour immediately into two bowls and enjoy.

Recipes for Tuesday **Breakfast**

Leftover filet mignon 2 oz (113/9/16/2-0-1/1-0/44)

I usually eat the filet cold out of the refrigerator, followed by the supplements. Then I swallow a tablespoon of cod liver oil. I drink decaffeinated coffee with a touch of heavy cream on the way to work.

Almond butter 2 Tbs. (180/16/7/7-4-2/4-0/0)

I scoop the almond butter into a bowl and then eat it with a spoon. Then I swallow a tablespoon of cod liver oil. I drink decaffeinated coffee with a touch of heavy cream on the way to work (again).

Soft-boiled egg with leftover sausage (150/10/19/1-0-1/0-1/248)

1 egg
2 pieces of leftover sausage (2 oz)
Salt and pepper to taste
1 Tsp. salsa (optional)

Place egg and the sausage in a pot of cold water and place on high heat. Bring to boil, reduce heat to low and cover. Let cook for 3-4 minutes. Then remove sausage to a plate. Place egg under cold water to cool. Shell egg, salt and pepper to taste.

Lunch

Bristling sardines in 2 layers (serves 1) (150/10/14/0/1-5/48)

1 can, eaten with a fork. The best sardines are the "Bristling Sardines in two layers" because they are small. This means you cannot appreciate the bones or other components more obvious in the larger sardines. You may choose the lightly smoked ones, but (unfortunately) the smoke may not be that good for you (but isn't life full of compromises? Yes!).

Sliced turkey rolled up with lettuce and spicy mustard (150/2/35/0/1-0/66)

4 oz sliced turkey. Turkey tends to be one of the cleanest of meats. Turkeys will die if you raise them in unhealthy environments, as opposed to chickens which can be treated atrociously and still survive only to end up on your table full of hormones and antibiotics. But if you can afford to buy organic with no nitrites or other preservatives, all the better!

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Sliced roast beef rolled up with lettuce and spicy mustard (230/9/34/0/2-0/90)

4 oz of sliced organic roast beef without preservatives rolled up with lettuce and spicy mustard and held together with a toothpick.

Snack

Chocolate (Ah, the sex surrogate)

Unsweetened chocolate is just a drug (but you love it). The 70% chocolate is a definite compromise, but perhaps one worth making for those of you who do not like the Baker's unsweetened. It does take a little getting used to, but as with spinach or broccoli or kale or collard greens, the training of the palate is important. Better living through chemistry. Avoid this if your allergies or asthma seems to be worse while eating this and better while not eating this (this is my experience, unfortunately- I guess I'll just have to have more sex?).

Dinner

Salmon fillets with mustard and mayo glaze (2 servings & 2 lunches) (492/37/36/2-0-2/17-9/93)

Calories 337, Fat 25, Mono 10, Poly 6/4, Sat 5, Carbohydrate 10, Sugar 9, Fiber 1, Protein 18

1 lb. Salmon fillet, cut into 4 equal pieces
4 Tbs. Grape seed oil mayonnaise
2 Tbs. spicy mustard
1 Tbs. lemon juice
4 or 5 cloves garlic, pressed

Place salmon in a shallow baking dish. Blend remaining ingredients together in a bowl and spread evenly over top of salmon fillets. Place under heated broiler for 5 minutes. Turn off oven keeping oven door closed and let "coast" for an additional 5-10 minutes or until the salmon is just opaque in the center. Transfer to a serving platter and serve immediately.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Broiled lamb kebobs Serves 4 (350/19/36/8-3-5/2-0/ 108)

1 lb. Boneless lamb loin
2 Tbs. olive oil
2 Tbs. Lemon juice
1 Tsp. Oregano
Salt and freshly ground pepper to taste
8 small onions, peeled
1 small red pepper
1 small yellow or green pepper

Cut the lamb into 1-inch cubes. Place the cubes in a glass dish and sprinkle with lemon juice, oregano, and salt and pepper to taste. Peel the onions and sauté the whole onions in olive oil 10 to 15 minutes or until almost tender. Seed the peppers and cut them into 1 1/2-inch pieces.

Thread the lamb alternating with vegetables onto flat-bladed metal skewers. Preheat the broiler. Place the skewers on a broiling pan and cook about 5 inches from the heat, turning every 3 to 4 minutes, for 12 minutes or until meat is brown outside but still pink inside.

Crustless crab and broccoli quiche Serves 6 (136/8/12/4-2-2/1-1/245)

1 Tbs. olive oil
1 cup chopped fresh broccoli
½ cup finely chopped sweet red pepper
¼ cup finely chopped onion
¼ cup water
4 large eggs, lightly beaten
1 (6-ounce) can lump crabmeat, drained
½ cup almond milk
½ Tsp. salt
¼ Tsp. dry mustard
¼ Tsp. ground red pepper

Combine broccoli, sweet red pepper, onion, and olive oil in a medium saucepan. Cover and cook over medium heat 3 to 5 minutes or until vegetables are crisp-tender. Combine vegetable mixture, beaten eggs and next 6 ingredients in a large bowl, stirring well. Pour mixture into a 9-inch quiche dish coated with cooking spray. Bake at 350° for 35 to 40 minutes or until set. Let stand 10 minutes before slicing into 6 wedges.

Dessert

Blueberry smoothie Serves 2 (157/9/6/18-8-10/2-3/0)

1 cup frozen blueberries
15 almonds
1 cup filtered water
½ Tsp. vanilla
(1 pack of Stevia)

Place nuts in blender and blend until chopped into fine pieces. Add the water and blend on high while adding the blueberries. Blend for 2-3 minutes or until thick. Pour immediately into two bowls and enjoy.

Recipes for Wednesday **Breakfast**

Two coddled eggs with salmon Serves 2 (140/9/12/2-0-2/3-0/426) & (90/6/9/0/2-6/)

2 eggs
1 Tsp. butter
2 Egg Coddlers
Salt and pepper to taste
2 oz. of leftover salmon

Fill a pot of water enough to immerse the coddlers to just below their lids (about 2/3 the way up the coddler) and heat to boiling. Place ½ Tsp. of butter in each coddler, cover and place in boiling water for 1 minute to melt the butter. Remove the coddlers and carefully break 1 egg into each coddler, cover and return to boiling water for 4 minutes. Remove from water and serve immediately. May be eaten directly from the coddler.

Organic Italian turkey sausage (serves 1) (160/6/26/4-2-2/2-0/70)

Buy the package of 3 or 4 sausages and cook them up on Sunday. Put them in a bowl with plastic wrap in the refrigerator to have throughout the week. One sausage is a 4 oz serving.

Organic turkey kielbasa (serves 1) (118/6/18/2-0-2/0-0/28)

The nice thing about this is the Kielbasa is already fully cooked, so you can snack on it whenever you want. You may heat it or eat it cold. Each 1 inch of sausage is approximately 1 oz, so 3-4 inches is a serving (4 oz).

Lunch

Kippers Serves 1 (165/12/11/0/2-9)
Kippered herring 3.75 oz. can

If you like smoked oysters, you will probably like kippers. They are not like sardines at all. I don't even like sardines but I eat them because they are good for you. Kippers have no bones (and therefore not rich in calcium) and have the consistency of tuna.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Curried tuna salad Serves 1 (228/11/31/3-2-1/3-1/37)

6 oz can of solid white tuna, drained
1 Tbs. Grape seed oil mayonnaise
1 celery stalk, finely chopped
½ Tsp. curry powder
Salt and pepper to taste

Mix all ingredients together. May serve with mixed green salad.

Snacks

Brazil nuts (1 oz is 8 nuts) (190/19/4/3-2-1/7-0/0)

Brazil nuts are rich in selenium, which appears to reduce cancer of the colon, prostate and lung. They are very low in carbohydrates but higher in omega-6 oils. Be sure to take the cod liver oil or eat your sardines or kippers if you are going to eat these.

Pecans (1 oz is 14 pecan halves) (200/20/3/4-2-2/9-0/0)

Pecans are also high in omega-6 oils, but their high fat content make them taste very rich.

Walnuts (1 oz is 14 walnut halves) (180/17/4/3-2-1/??/0)

Walnuts have the highest omega-3 content of all of the tree nuts and are very low in carbohydrates.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Dinner

Flounder fillet with shrimp Serves 2 (285/10/46/3-2-1/2-1/162)

2 onion slices
1 Tsp. lemon juice
2 parsley sprigs
1 bay leaf
¼ Tsp. ground thyme
12 small shrimp, shelled and deveined (4 oz)
4 flounder fillets (4 ounces each)
Salt and freshly ground black pepper
¼ pound mushrooms, sliced
1 cup water
1 Tbs. olive oil

Preheat oven to 325° F. Sauté the mushrooms onion slices in the olive oil. Add the lemon juice, parsley, bay leaf, thyme, and water. Bring mixture to a boil. Add the shrimp, and cook them for three to five minutes.

Place the flounder fillets in a double layer in a two-inch-deep baking dish, seasoning between the layers with salt and pepper. Pour the sauce over the fish, cover and bake for fifteen to twenty minutes or until the fish flakes easily when tested with a fork. Garnish with shrimp and place under the broiler until lightly browned and bubbly hot.

Steak with onions Serves 2 (338/27/48/6-2-4/3-0/150)

2-one inch thick steaks 6 oz. each
1 small onion
1 Tbs. Butter or olive oil
Salt and pepper to taste

Slice onion and sauté in butter or oil in a heavy pan. Reserve onion, heat pan to hot and sear steak on each side (2-3 minutes). Return onions to pan and cover while turning off the heat. The heavy pan will continue to slowly cook the steak for the next 10-15 minutes. The result should be medium rare. If you prefer your steak more done, extend the initial cooking time to 4-5 minutes.

Shrimp with pesto Serves 2 (568/35/42/3-2-1/5-2/260)

12 oz fresh or frozen shrimp
1 cup fresh basil
1 large garlic clove, pressed
¼ cup olive oil
1 Tbs. grated Parmesan cheese

Add basil, garlic and olive oil to blender and blend on medium-high until basil is completely chopped and mixed with olive oil. Add Parmesan cheese and blend until mix. Let set while cooking shrimp.

Boil water in medium pot, add shrimp and cook for 3-4 minutes for fresh shrimp or 4-6 minutes for frozen shrimp. Drain shrimp and place in bowl. Pour pesto sauce over the shrimp, stir and serve immediately or may keep in refrigerator to serve later.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Vegetables

Sautéed zucchini with garlic (83/7/2/4-2-2/1-0/0)

2 small or one large zucchini, sliced 1/4 inch thick
1 Tbs. olive oil
1 clove garlic, crushed in a press
1/4 Tsp. red and black pepper

Add olive oil to skillet; cook the zucchini and onion over medium heat. Add the remaining ingredients and cook on low heat for 3 minutes or until the zucchini has reached a desired tenderness.

Sautéed zucchini with onion (83/7/2/4-2-2/1-0)

2 small or one large zucchini, sliced 1/4 inch thick
1 medium onion, sliced into 1/4 inch wedges
1 Tbs. olive oil
2 dashes of red and black pepper

Add olive oil to skillet; cook the zucchini and onion over medium heat. Add the remaining ingredients and cook on low heat for 3 minutes or until the zucchini has reached a desired tenderness.

Asparagus with lemon (60/0/6/12-4-8/0)

14 spears of asparagus
1 Tsp. butter
1 Tbs. water
1 Tbs. lemon juice

Place all ingredients in skillet and heat to steaming. Cover and simmer on low for 4-6 minutes. Remove from heat and serve immediately on a warm plate.

Dessert

Blueberry smoothie Serves 2 (157/9/6/18-8-10/2-3/0)

1 cup frozen blueberries
15 almonds
1 cup filtered water
½ Tsp. vanilla
(1 pack of Stevia)

Place nuts in blender and blend until chopped into fine pieces. Add the water and blend on high, adding the blueberries slowly. Blend for 2-3 minutes or until thick. Pour immediately into two bowls and enjoy.

Recipes for Thursday

Breakfast

Two eggs over-easy (140/9/12/2-0-2/3-0/426) **with organic turkey bacon** (40/1/6/0/0-0/70) Serves 1

2 eggs
1 Tbs. Butter or olive oil
2 slices of organic turkey bacon

First heat the oil/butter and turkey bacon in a heavy skillet. Cook bacon until done to your liking (crisp or otherwise). Scrape pan (leaving the "stuff" along the sides) and add eggs to skillet on medium-low heat. You may need to add a little more oil/butter before adding eggs. When whites are solidified, flip the eggs (cover for "sunny side up" eggs). Turn off heat to prevent overcooking.

Kippers in wine sauce (rinsed) (in bottles found in the refrigerated section of the grocery store) (152/8/10/4-0-4/0-3/38)

3 oz of kippers, rinsed in water (approximately 1/3 cup of kippers)

Enjoy with a knife and fork.

Kippers in cream sauce (rinsed) (in bottles found in the refrigerated section of the grocery store) (152/8/10/4-0-4/0-3/38)

3 oz of kippers, rinsed in water (approximately 1/3 cup of kippers)

Enjoy with a knife and fork.

Lunch

Mixed green salad with hard-boiled egg Serves 2 (103/5/8/8-2-6/1-0/213)

4 cups (1/2 lb.) mixed greens or lettuce
1 hard boiled egg, sliced
½ cucumber, sliced thinly

Mix all ingredients and serve in large shallow bowls. Put anchovies as desired on salads. Place decanters of olive oil and rice vinegar on the table for individuals to serve themselves as needed. Add Ranch dressing or olive oil and vinegar.

Ranch dressing Serves 2 193/20/0/2-0-2/2-0/21)

1 Tbs. olive oil
1 Tbs. organic heavy cream
1 Tbs. Rice vinegar
1 Tsp. Lemon juice
Dash of onion powder
Salt and pepper to taste
Dash of garlic powder (optional, but good!)

Mix ingredients well and pour on salad. (I agree that adding the organic heavy cream is a compromise, but use the rest in your decaffeinated coffee?)

Leftover steak with zucchini Serves 1 (113/9/19/2-1-2/1-0/50)

Save 2 oz of steak (that is ½ the size of your palm) from the dinner the night before for your lunch today.

Leftover shrimp with pesto Serves 1 (184/12/14/1-0-0/2-1/84)

Save 1/3 cup of the Shrimp dish from dinner the night before to eat for your lunch today.

Dinner

Flounder Creole Serves 2 (340/19/30/12-2-10/2-5/100)

Flounder fillets 1 lb.
2 Tbs. olive oil
½ red onion, chopped
2 cloves garlic, crushed
7 oz can of whole tomatoes, undrained and chopped
1 Tbs. Worcestershire sauce
1 Tbs. rice vinegar
3/4 Tsp. dried basil
1/4 Tsp. salt
Pinch ground red pepper

Heat oil in large skillet or wok over medium heat. Add onion and garlic and sauté until tender. Add tomato and remaining ingredients except fish. Bring to a boil. Add fillets, spooning tomato mixture over fish. Reduce heat, cover and simmer 12 minutes.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Shrimp, crab and scallop stew (Serves 2 plus two 1/3 cup lunch servings) (407/17/48/13-3-10/2-3/285)

2 Tbs. olive oil
½ cup chopped onion
1 clove garlic, minced
7 oz can of whole tomatoes, undrained and chopped
¼ cup chopped fresh oregano
2 Tbs. chopped fresh parsley
1 Tsp. low-sodium Worcestershire sauce
1/8 Tsp. red pepper
½ pound bay scallops (fresh or frozen)
½ pound medium-size shrimp, peeled and de-veined (fresh or frozen)
2 oz. can of white crab meat

Add the olive oil to the pot; place over medium-high heat until hot. Add chopped onion, sweet red pepper, add minced garlic; sauté until vegetables are tender. Add tomato, stirring well to combine. Add oregano and next 3 ingredients; stir well. Bring vegetable mixture to a boil over medium heat; cover, reduce heat, and simmer 20 minutes. Add scallops and shrimp to vegetable mixture; bring to a boil. Reduce heat, and simmer 7 to 8 minutes or until scallops and shrimp are done.

Italian pot roast (2 dinner servings and a lunch) (600/46/60/12-5-7/0-0/180)

1 lb. organic beef roast cut into 2-inch cubes
¼ lb. hot organic Italian sausage
1 medium onion, chopped
3 garlic cloves, pressed
2 carrots cut into 1-inch pieces
4 celery stalks, cut into 1-inch pieces
1 red pepper, chopped
12 mushrooms, sliced
2 Tbs. fresh chopped parsley
½ Tsp. thyme
½ Tsp. oregano
1 Tsp. basil
½ Tsp. cayenne pepper
1/8-Tsp. fennel seeds
2 Tbs. olive oil
1 Tbs. organic butter
2 Tbs. organic heavy cream
1 cup water

Heat olive oil and butter in large pot. Sauté beef and sausage for 5 minutes or until browned. Add onion and garlic and sauté for additional 5 minutes. Add remaining ingredients, bring to boil, cover and reduce heat and simmer for 1-1/2 to 2 hours or until beef is tender. Serve in bowls.

Dessert

Fresh berries with heavy cream and brandy Serves 2 (116/5/2/15-6-9/0/15)

½ cup fresh blueberries
½ cup fresh raspberries
1 cup fresh strawberries, halved
2 Tbs. organic heavy cream
2 Tsp. Brandy

Mix berries and distribute evenly into two shallow bowls. Pour 1 Tbs. of cream followed by 1 Tsp. Brandy on fruit.

Recipes for Friday

Breakfast

Omelet w/ lox and sautéed onions Serves 1 (298/24/17/0/3-3/462)

2 eggs
1 Tbs. organic heavy cream
1 Tbs. chopped onion
1 oz. lox or nova salmon cut into small pieces
1 Tsp. olive oil or butter
Salt and pepper to taste

Beat eggs and cream until mixed. Put olive oil or butter in shallow pan over medium heat. Sauté onion and reserve. Pour egg mixture into pan and swish pan to spread the egg mixture over the pan. Reduce heat to low and add the onion and lox over half of the egg mixture. Flip the other half over the lox and onions. Cook 2-3 more minutes, flipping omelet once.

Organic ham and cheese omelet Serves 1 (376/30/28/0/3-0/487)

2 eggs
1 Tbs. heavy cream
1 oz. goat cheese, crumbled
1 oz. organic ham or turkey, chopped
1 Tbs. butter
Salt and pepper to taste

Beat eggs and cream until mixed. Put olive oil or butter in shallow pan over medium heat. Pour egg mixture into pan and swish pan to spread the egg mixture over the pan. Reduce heat to low and add the cheese and ham over half of the egg mixture. Flip the other half over the cheese and ham. Cook 2-3 more minutes, flipping omelet once.

Lunch

Brisling sardines in 2 layers packed in olive oil 1 can (156/10/48/0/1-5/48)

Tamari tuna salad Serves 1 (228/11/31/3-2-1/3-1)

6 oz can of solid white tuna, drained
1 Tbs. Grape seed oil mayonnaise
1 celery stalk, finely chopped
½ Tsp. Tamari sauce
Salt and pepper to taste

Mix all ingredients together. May serve with mixed green salad.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Curried chicken salad Serves 2 (206/18/31/5-2-3/4-0)

½ lb. boiled chicken or turkey breast
1 Tbs. Grape seed oil mayonnaise
½ Tbs. Seasoned rice vinegar
1 Tsp. lemon juice
2 celery stalks- finely chopped
1 Tsp. Curry powder
Salt and pepper to taste
Optional: 1 Tbs. Chopped onion

Mix all ingredients together. May serve with mixed green salad.

Dinner

Renaissance Greek salad (Serves 2 adults) (600/50/18/20-6-14/2-0/44)

4 cups (6 oz) mixed greens or lettuce
12 mushrooms, quartered
1 large tomato, chopped
1 green pepper, chopped
¼ Bermuda onion, thinly sliced
10 Black olives (pitted or non-pitted)
½ cucumber, sliced thinly
4 oz. Feta (goat) cheese, crumbled
¼ cup olive oil
1 Tbs. lemon juice
1 Tbs. rice vinegar
½ Tsp. oregano leaves
Salt and pepper to taste
Optional: 1 small can of anchovies

Mix salad ingredients and serve in large shallow bowls. Combine olive oil, vinegar and lemon juice; pour over salad and toss. Place anchovies as desired on salads. You may also have decanters of olive oil and rice vinegar on the table for individuals to serve themselves in addition. Salt and ground pepper to taste. (Is this as good as it gets? I think so!).

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Irish chicken dinner (Serves 2 plus lunch) (378/18/41/11-6-5/4-0/120)

½ small head green cabbage (about 1 pound)
1 small onion
4 carrots
1 cup loosely packed spinach leaves
3 chicken breasts, skinless and boneless (6 oz each)
2 Tbs. olive oil
1 Tbs. chicken bouillon
Salt and pepper to taste
3 whole cloves
1 large bay leaf

Cut cabbage and onion each into 5 wedges. Cut carrots into 2 1/2-inch pieces. Heat olive oil in large pot over medium-high heat. Cook cabbage and onion wedges until lightly browned.

Add chicken pieces, carrots, beef bouillon, peppercorns, cloves, bay leaf, and 2 cups water; over high heat, heat to boiling. Reduce heat to low; cover and simmer 40 minutes, gently stirring occasionally until chicken and vegetables are tender. Add spinach before removing from heat. Stir. Serve in bowls. Save ½ servings for lunches.

Irish lamb soup Serves 2 (470/26/44/9-5-4/2-0/135)

2 Tbs. olive oil
1 pound boneless lean lamb leg cut into 1-inch cubes
3 cups water
1 beef bouillon cube
½ head cabbage, coarsely chopped
3 carrots, chopped
1 medium onion, chopped
1 Tsp. dried thyme
1/4 Tsp. garlic powder
1/4 Tsp. ground allspice
1/4 Tsp. pepper
1 bay leaf

Heat large pot with olive oil over medium-high until hot. Add lamb; cook 5 minutes or until browned. Add water and remaining ingredients; bring to a boil. Cover, reduce heat, and simmer 20 minutes or until the lamb is tender, stirring occasionally. Discard bay leaf.

Dessert

Frozen blueberries with heavy cream Serves 2 (116/5/2/15-6-9/0/15)

1 cup frozen blueberries
2 Tbs. organic heavy cream

Pour frozen blueberries into two bowls. Add 1 Tbs. of heavy cream to each bowl and stir until the berries are coated with frozen cream. This is the best iced cream you will ever have.

Recipes for Saturday

Breakfast

The Japanese breakfast (serves 1) (400/18/21/5-7/8-2-6/243)
Smoked fish of choice 2 oz.
Soft-boiled egg in broth of soy sauce or Miso
Small green salad with sesame oil (1 Tbs.) and rice vinegar (1 Tsp.)

Place egg in pot and cover with cold water. Turn heat on high and cook for 5 minutes. Remove egg and place in cool water. Carefully shell egg and place in small bowl with Miso soup (see recipe in soup section). May add a dash of Soy sauce if desired.

Goat cheese omelet (serves 1) (336/28/23/0/3-0/469)
2 eggs
1 Tbs. heavy cream
1 oz. goat cheese, crumbled
1 Tsp. butter
Salt and pepper to taste

Beat eggs and cream until mixed. Melt butter in shallow pan over medium heat. Pour egg mixture into pan and swish pan to spread the egg mixture over the pan. Reduce heat to low and cook until egg is no longer runny. Spread the cheese over half of the egg mixture and flip the other half over the cheese. Cook 2-3 more minutes, flipping omelet once.

Oat bran waffles (4 servings of 2 waffles each) (339/23/10/22-2-20/160
10 almonds, unroasted
1/3 cup Light olive oil
1 cup spring or filtered water
1 cup Oat-bran flour
1 Tsp. Baking powder
3 eggs (Omega-3 enriched if available)

Put almonds in blender and blend until nuts are in powder. Now add water and blend to create almond milk. Add olive oil and eggs and blend to a smooth liquid. Pour into bowl and add remaining dry ingredients and mix well. Let sit for 5 minutes. Bake in greased waffle iron for 3 minutes per waffle. Serve with strawberries (and whipped cream?).

Topping for waffles Serves 1 (78/6/1/11-4-7/0-0/21)
4 strawberries, fresh or frozen, sliced
1 Tbs. heavy cream, plain or whipped

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Lunch

The Japanese lunch (130/11/9/1-5/0-0-0/30)
Sashimi tray from grocery store (buy the day before and keep in refrigerator until eaten).

Eat fish with ginger and wasabi (peel fish off and leave the rice in the tray).

Dinner

The Japanese dinner (430/29/30/6-12/8-2-6/60)
Sashimi Platter — Green salad with dressing
Miso soup

Go to your local Japanese restaurant and order their sashimi platter with Miso soup. It may also come with a spring roll (which is decadent but eat it anyway, with lots of wasabi and soy sauce).

Baked chicken breast with fresh basil Serves 4 (319/14/44/8-2-6/5-0/226)

4 boneless skinless chicken breasts (24 oz)	2 Tbs. olive oil
¼ chopped fresh basil	½ cup oat bran
2 eggs, beaten	Salt and pepper

Pour oil into bowl and coat chicken with olive oil. Arrange in single layer in baking dish. Combine egg into olive oil; add basil and oat bran; mix well and spread over chicken.

Cover baking dish with foil and place in 375-degree oven for 30 minutes or until chicken is no longer pink inside.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Mexican chicken salad Serves 2 (296/17/25/13-5-8/1-0/80)

1 white daikon thinly sliced
8 oz. diced cooked chicken breast
1 medium cucumber sliced thinly and halved into crescents
½ medium red onion thinly sliced, in crescents
2 Tbs. olive oil
2 Tbs. lime or lemon juice
1 Tsp. salt
½ medium head romaine lettuce, torn in 2-inch pieces
¼ Tsp. chili powder
2 Tbs. coarsely chopped cilantro

Place cut up daikon in a large glass bowl. Add the chicken, cucumber and onion. In a small bowl, whisk together the oil, lime juices, and salt. Mix until blended. Pour the dressing over the chicken salad and toss to blend.

Arrange lettuce on two large salad plates. Heap half of the chicken salad on each plate. Sprinkle with the chili powder and the cilantro. Serve immediately.

Cucumber salad

2 cups cucumbers, cut in half lengthwise, seeded and chopped
1/2 cup carrots, grated or finely diced
1/4 cup scallions or red onion, finely chopped
2 Tsp. Fresh ginger, peeled and minced
1 clove garlic, finely chopped
1/2 cup water
1/4 cup white vinegar

Combine all vegetables with ginger, garlic and crushed peppercorns in a medium or large bowl. Add vinegar and mix thoroughly. Cover and refrigerate at least 30 minutes before serving. Best if prepared a day ahead.

Black-eyed peas with garlic and kale Serves 2 (226/14/12/22-9-13/2-0/0)

1 bunch of kale washed and drained
2 Tbs. olive oil
1 clove garlic, pressed
Pinch of dried red pepper
1 cup canned or cooked black-eyed peas
1 Tbs. Cider vinegar, or to taste

Pull the kale leaves from the stems (discard stems) and chop the leaves into one inch pieces. Place about one inch of water in a large pot and heat to boiling. Add the kale, cover and cook until tender, stirring occasionally, 5 to 10 minutes. Drain. In a large non-stick skillet, combine the oil and garlic. Cook the garlic over low heat, stirring, until it begins to sizzle, about two minutes. Add the peas and red pepper and cook until blended, stirring, about three minutes. Add the kale and stir to blend over low heat. Add the cider vinegar just before serving. Serve hot or at room temperature.

Recipes for Sunday

Breakfast

Low carb waffles with blueberries Serves 6 (258/11/22/5-1/6-3-2/104)

2/3 cups almonds and walnuts with a few Brazil nuts
1 cup filtered water
3 organic eggs
1/3 cup whey protein powder
1 Tsp. baking powder
1/3 cup light olive oil
1 cup blueberries, fresh or frozen
(Whipped organic cream)

Put the mixed nuts and water in the blender and blend until mixture turns into nut-milk (about 3 minutes). Add eggs and olive oil and blend one minute. Pour mixture into bowl and add whey protein powder and baking powder and mix well. Put 1/3 cup of mixture in heated, greased waffle iron and cook for 3 minutes. Remove and eat immediately with blueberries (and whipped cream?). You may freeze them to eat for a quick breakfast during the week.

Western omelet Serves 2 (262/21/14/4-1-3/2-1/556)

4 eggs (organic)
1 Tbs. fresh chives (1 Tsp. dried)
1 Tbs. chopped green pepper
1 Tbs. chopped onion
¼ Tsp. dried basil
4 large mushrooms, sliced
2 Tbs. Salsa
1 Tbs. butter or olive oil

Sauté the vegetables in the butter or olive oil. Break eggs into bowl and beat until blended. Pour the vegetables onto a plate. Then add the egg mixture to the pan coating the bottom of the pan. Cover pan and cook for 1-2 min on medium heat. Add vegetable mixture and fold omelet in half. Cover pan, turn off heat and let coast turning once more. Serve hot.

Lunch

Salmon cakes Serves 1 (260/22/18/3-2-1/6-5/50)

1 7-ounce can of Salmon (3 oz dry weight)
½ stalk celery, chopped
1 Tbs. minced onion
1 clove garlic, pressed
1 Tsp. dried parsley (or 1 Tbs. fresh)
1 Tbs. Grapeseed or canola oil mayonnaise
1 Tsp. olive oil
Salt and pepper to taste

Mix all ingredients except the olive oil in a bowl and mix well. Press mixture into 2 patties. Heat olive oil (or butter) in pan and sauté cakes until they develop a crust. Then flip with a spatula. Eat warm or cold.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Crab cakes Serves 2 (190/11/9/3-2-1/0-2/50)

2 2-oz cans of crabmeat
1 egg white (discard yolk)
1 stalk celery, chopped finely
1 Tbs. minced fresh parsley
1 Tbs. Grapeseed or canola oil mayonnaise
Salt and pepper to taste
1 Tbs. olive oil

Mix all ingredients except the olive oil in a bowl and mix well. Press mixture into 2 patties. Heat olive oil (or butter) in pan and sauté cakes until they develop a crust. Then flip with a spatula. Eat warm or cold.

Shrimp salad Serves 2 (220/11/24/4-2-2/5-1/173)

2 cups cooked shrimp (8 oz)
2 Tbs. Grapeseed or canola oil mayonnaise
2 Tsp. capers
1 stalk celery, chopped
1 Tbs. Lemon juice
Freshly ground black pepper

Cut the shrimp into bite-size pieces. Place in a bowl. Add mayonnaise, capers and celery. Sprinkle lemon juice and pepper to taste over the salad. Stir to coat shrimp and blend ingredients. Serve on lettuce leaves.

Dinner

Curried chicken salad with grapes and celery Serves 4 (287/14/25/14-2-12/4-1/85)

1 lb. boiled chicken breast
4 Tbs. grape seed or canola oil mayonnaise
1-2 Tsp. curry powder (to taste)
1 Tsp. lemon juice
2 celery stalks- finely chopped
2 cups of red or green seedless grapes
Salt and pepper to taste

Mix all ingredients together. Serve with mixed green salad.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Herbed lamb chops with asparagus Serves 2 (506/30/46/13-5-8/0-0/155)

2 lamb chops ½ inches thick (6 oz. each)
1 Tsp. chopped fresh basil
1 Tsp. crushed rosemary
1 Tsp. thyme
2 Tbs. olive oil or butter
1 large onion, sliced
2 cloves garlic, peeled but left whole (optional)
1/3 cup dry white wine
14 spears of asparagus

Heat 1Tbs. oil or butter in large skillet and sauté the onions and garlic. Discard the garlic but reserve the onion on a plate. Add remaining oil or butter and brown the lamb chops over high heat for 2 minutes on each side. Remove lamb chops to a plate. Add the spices, asparagus and wine to the skillet and heat for 3-4 minutes, scrapping up the remnants of lamb from the bottom of the pan. Return the lamb chops and onions to the pan and coat with the juices.

Beef and mushroom stew Serves 4 (293/17/18/10-2-7/0-0/125)

1 ½ pounds lean boneless organic steak
2 Tbs. olive oil
1 large onion, sliced
1 clove garlic, minced
¾ cups water
1 Tbs. chopped fresh oregano
1 Tsp. chopped fresh parsley
1 Tsp. chopped fresh basil
1 beef-flavored bouillon
½ Tsp. cracked pepper
8 oz sliced fresh mushrooms
¼ pound snow pea pods, trimmed and cut into 1-inch pieces

Trim fat from boneless steak, and cut steak into 1-inch pieces. Add olive oil to pot; place over medium-high heat until hot. Add steak pieces; sauté until browned on all sides, stirring frequently. Add onion and garlic; sauté until onion is tender. Stir in water, oregano, parsley, and basil. Add bouillon and pepper, stirring well. Bring to a boil; cover, reduce heat, and simmer 30-60 minutes. Add mushrooms; cover and cook 10 minutes. Add snow peas; cover and cook an additional 5 minutes or until crisp- tender.

To serve, ladle beef stew into individual serving bowls. Yield: 6 cups.

Shop the Periphery of the Grocery Store

If a Food will not Rot or Sprout
Don't eat it, but
Throw it out!

8

THE MEDITERRANEAN HUNTER-GATHERER

COOKBOOK

More Recipes to Get You Started

Most of the recipes from elsewhere in the book are also included in this section to save time when we are in a hurry

You are what you eat…

So watch what you eat !!!!!!!

THE MEDITERRANEAN HUNTER-GATHERER COOKBOOK

Beef Burritos and Salad
Chinese Chicken with Broccoli and Peanuts

Meat/Fish/Poultry Salads

Tuna Salad
Chicken Salad

Shrimp, crab and scallop stew (Serves 2 plus two 1/3 cup lunch servings) (407/17/48/13-3-10/2-3/285)

2 Tbs. olive oil
½ Cup chopped onion
1 clove garlic, minced
7 oz can of whole tomatoes, undrained and chopped
¼ Cup chopped fresh oregano
2 Tbs. chopped fresh parsley
1 Tsp. low-sodium Worcestershire sauce
1/8 Tsp. red pepper
½ pound bay scallops (fresh or frozen)
½ pound medium-size shrimp, peeled and de-veined (fresh or frozen)
2 oz. can of white crab meat

Add the olive oil to the pot; place over medium-high heat until hot. Add chopped onion, sweet red pepper, add minced garlic; sauté until vegetables are tender. Add tomato, stirring well to combine. Add oregano and next 3 ingredients; stir well. Bring vegetable mixture to a boil over medium heat; cover, reduce heat, and simmer 20 minutes. Add scallops and shrimp to vegetable mixture; bring to a boil. Reduce heat, and simmer 7 to 8 minutes or until scallops and shrimp are done.

Shrimp with pesto Serves 2 (568/35/42/3-2-1/5-2/260)

12 oz fresh or frozen shrimp
1 cup fresh basil
1 large garlic clove, pressed
¼ cup olive oil
1 Tbs. grated Parmesan cheese

Add basil, garlic and olive oil to blender and blend on medium-high until basil is completely chopped and mixed with olive oil. Add Parmesan cheese and blend until mix. Let set while cooking shrimp.

Boil water in medium pot, add shrimp and cook for 3-4 minutes for fresh shrimp or 4-6 minutes for frozen shrimp. Drain shrimp and place in bowl. Pour pesto sauce over the shrimp, stir and serve immediately or may keep in refrigerator to serve later.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Crustless crab and broccoli quiche Serves 6 (136/8/12/4-2-2/1-1/245)

1 Tbs. olive oil
1 cup chopped fresh broccoli
½ cup finely chopped sweet red pepper
¼ cup finely chopped onion
¼ cup water
4 large eggs, lightly beaten
1 (6-ounce) can lump crabmeat, drained
½ cup almond milk
½ Tsp. salt
¼ Tsp. dry mustard
¼ Tsp. ground red pepper

Combine broccoli, sweet red pepper, onion, and olive oil in a medium saucepan. Cover and cook over medium heat 3 to 5 minutes or until vegetables are crisp-tender. Combine vegetable mixture, beaten eggs and next 6 ingredients in a large bowl, stirring well. Pour mixture into a 9-inch quiche dish coated with cooking spray. Bake at 350° for 35 to 40 minutes or until set. Let stand 10 minutes before slicing into 6 wedges.

Crab cakes Serves 2 (190/11/9/3-2-1/0-2/50)

2 2-oz cans of crabmeat
1 egg white (discard yolk)
1 stalk celery, chopped finely
1 Tbs. minced fresh parsley
1 Tbs. Grapeseed or canola oil mayonnaise
Salt and pepper to taste
1 Tbs. olive oil

Mix all ingredients except the olive oil in a bowl and mix well. Press mixture into 2 patties. Heat olive oil (or butter) in pan and sauté cakes until they develop a crust. Then flip with a spatula. Eat warm or cold.

Salmon cakes Serves 1 (260/22/18/3-2-1/6-5/50)

1 7-ounce can of Salmon (3 oz dry weight)
½ stalk celery, chopped
1 Tbs. minced onion
1 clove garlic, pressed
1 Tsp. dried parsley (or 1 Tbs. fresh)
1 Tbs. Grapeseed or canola oil mayonnaise
1 Tsp. olive oil
Salt and pepper to taste

Mix all ingredients except the olive oil in a bowl and mix well. Press mixture into 2 patties. Heat olive oil (or butter) in pan and sauté cakes until they develop a crust. Then flip with a spatula. Eat warm or cold.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Baked haddock Serves 4
Calories 215, Fat 10, Mono 7, Poly 1/1, Sat 1, Carbohydrate 9, Sugar 4, Fiber 3, Protein 21

1 pound fresh or frozen haddock fillets,
2 Tbs. Lemon juice
1-2 cloves garlic, crushed
4 green onions with tops, chopped
1 stalk celery, chopped
2 Tbs. olive oil
1/4 cup dry white wine
2 tomatoes, peeled and chopped (11 oz can or 2 fresh)
1/8 Tsp. red and black pepper
2 parsley sprigs, chopped
5 fresh basil leaves, minced (or 1/2 Tsp. dried)
Lemon wedges

Allow haddock fillets to stand at room temperature 30-60 minutes (if frozen). Preheat oven to 425 degrees. Sauté green onions, celery and garlic in olive oil in large skillet over medium heat for 3 minutes. Add wine, chopped tomatoes, parsley, and basil. Simmer uncovered over medium heat, stirring occasionally until thickened (about 20 minutes).

Cut fish into 8 portions of equal thickness, cutting on a slant. Place into a baking pan just large enough to fit portions. Cover with mixture of lemon juice and pepper. Bake fish 15 minutes uncovered. Remove from oven and pour sauce over fish. Reduce oven to 350 degrees and bake fish 5 to 8 minutes longer, or until fish becomes opaque.

Flounder Creole Serves 2 (340/19/30/12-2-10/2-5/100)

Flounder fillets 1 lb.
2 Tbs. olive oil
½ red onion, chopped
2 cloves garlic, crushed
7 oz can of whole tomatoes, undrained and chopped
1 Tbs. Worcestershire sauce
1 Tbs. rice vinegar
3/4 Tsp. dried basil
1/4 Tsp. salt
Pinch ground red pepper

Heat oil in large skillet or wok over medium heat. Add onion and garlic and sauté until tender. Add tomato and remaining ingredients except fish. Bring to a boil. Add fillets, spooning tomato mixture over fish. Reduce heat, cover and simmer 12 minutes.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Sautéed flounder Serves 2 (320/13/38/6-2-4/1-2/100)

1 lb. Flounder fillet
1 medium onion, sliced
2 Tbs. fresh parsley, chopped finely
1 Tbs. organic butter or olive oil
¼ Tsp. red pepper
Salt to taste
Dash of soy sauce

Heat heavy skillet until hot. Add butter and onion, reduce heat and sauté until limp (1-2 minutes). Add fillet and cook the first side until fish is no longer translucent (3-4 minutes). Turn and cook second side as the first. Cover and turn off heat. Let sit for 3-5 minutes. The fish will be easy to pull apart with a fork when done.

Flounder fillet with shrimp Serves 2 (285/10/46/3-2-1/2-1/162)

2 onion slices
1 Tsp. lemon juice
2 parsley sprigs
1 bay leaf
¼ Tsp. ground thyme
12 small shrimp, shelled and deveined (4 oz)
4 flounder fillets (4 ounces each)
Salt and freshly ground black pepper
¼ pound mushrooms, sliced
1 cup water
1 Tbs. olive oil

Preheat oven to 325° F. Sauté the mushrooms and onion slices in the olive oil. Add the lemon juice, parsley, bay leaf, thyme, and water. Bring mixture to a boil. Add the shrimp, and cook them for three to five minutes.

Place the flounder fillets in a double layer in a two-inch-deep baking dish, seasoning between the layers with salt and pepper. Pour the sauce over the fish, cover and bake for fifteen to twenty minutes or until the fish flakes easily when tested with a fork. Garnish with shrimp and place under the broiler until lightly browned and hot.

Indian grilled shrimp Serves 4 (280/10/26/6-3-3/2-1/320)

16 oz. Shrimp, peeled and deveined
1 1/2 Tbs. Lemon or lime juice
2 Tbs. olive oil
3 garlic cloves, crushed through a press
1 1/2-Tsp. Fresh thyme leaves (or 3/4 Tsp. Dried)
1/4-1/2 Tsp. Crushed red pepper (or to taste)
1 Tsp. Ground turmeric
1/4 Tsp. Ground cumin
1 cup wild rice
2 cups water
1/2 Tsp. Salt

Toss shrimp with lime juice, garlic, thyme and red pepper. Cover and marinate at least one hour. When ready to cook, start with the rice. Place turmeric, cumin and rice in a skillet and heat over low heat, just until fragrant (about 30 seconds). Add water and salt.

Heat to boiling, then cover and cook over low heat until water is absorbed and rice is tender (about 15 minutes).

Prepare shrimp when rice is almost done; cook quickly in olive oil until lightly browned on both sides. Spoon rice onto a platter and top with shrimp.

Salmon fillets with lemon and garlic Serves 4 (337/25/18/10-1-9/6-4/168)

1 lb. Salmon fillet, cut into 4 equal pieces
¾ cup extra-virgin olive oil
½ cup fresh orange juice
Juice of 1 lemon
4 to 5 Tbs. soy sauce
I red onion, cut lengthwise into thin slices
4 or 5 cloves garlic, pressed
I (1-inch) piece ginger root, thinly sliced
½ Tsp. chili powder

Place salmon in a shallow baking dish. For marinade, combine remaining ingredients in a medium bowl. Pour marinade over salmon. Marinate in the refrigerator 2 to 3 hours, occasionally spooning marinade over salmon.

Preheat broiler. Drain salmon, reserving marinade. Place salmon on foil in broiler pan. Broil, brushing frequently with marinade, until browned on the topside, about 3 minutes. Turn and broil until the salmon is just opaque in the center, about 3 minutes. Transfer to a serving platter and serve immediately.

Salmon fillets with mustard and mayonnaise glaze Serves 2 & 2 lunches (492/37/36/2-0-2/17-9/93)

1 lb. Salmon fillet, cut into 4 equal pieces
4 Tbs. Grape seed oil mayonnaise
2 Tbs. spicy mustard
1 Tbs. lemon juice
4 or 5 cloves garlic, pressed

Place salmon in a shallow baking dish. Blend remaining ingredients together in a bowl and spread evenly over top of salmon fillets. Place under heated broiler for 5 minutes. Turn off oven keeping oven door closed and let “coast” for an additional 5-10 minutes or until the salmon is just opaque in the center. Transfer to a serving platter and serve immediately.

POULTRY

Irish chicken dinner Serves 2 plus lunch (378/18/41/11-6-5/4-0/120)

½ small head green cabbage (about 1 pound)
1 small onion
4 carrots
1 cup loosely packed spinach leaves
3 chicken breasts, skinless and boneless (6 oz each)
2 Tbs. olive oil
1 Tbs. chicken bouillon
Salt and pepper to taste
3 whole cloves
1 large bay leaf

Cut cabbage and onion each into 5 wedges. Cut carrots into 2 1/2-inch pieces. Heat olive oil in large pot over medium-high heat. Cook cabbage and onion wedges until lightly browned.

Add chicken pieces, carrots, chicken bouillon, peppercorns, cloves, bay leaf, and 2 cups water; over high heat, heat to boiling. Reduce heat to low; cover and simmer 40 minutes, gently stirring occasionally until chicken and vegetables are tender. Add spinach before removing from heat. Stir. Serve in bowls. Save ½ servings for lunches.

Baked chicken breast with fresh basil Serves 4 (319/14/44/8-2-6/5-0/226)

4 boneless skinless chicken breasts (24 oz)
¼ chopped fresh basil
2 eggs, beaten
2 Tbs. olive oil
½ cup oat bran
Salt and pepper

Pour oil into bowl and coat chicken with olive oil. Arrange in single layer in baking dish. Combine egg into olive oil; add basil and oat bran; mix well and spread over chicken.

Cover baking dish with foil and place in 375-degree oven for 30 minutes or until chicken is no longer pink inside.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Curried turkey Serves 4 (295/12/32/6-2-4/5-0/180)

1 lb. turkey breast cut into cubes
1 Tbs. parsley flakes
1/8 Tsp. Pepper
2 Tbs. olive oil
1/2 cup minced onion
1 tart apple
1-2 Tsp. Curry powder
1/4 to 1/2 Tsp. Ginger
1/8 Tsp. Ground cloves
1 cup chicken broth or bouillon
1 Tsp. Lemon juice

Brown turkey and onion in olive oil in a skillet. Add parsley and pepper. While turkey cooks, mince apple into small pieces. Add onion, apple, curry and ginger. Cook, stirring occasionally, until onion and apple are transparent. Blend in liquid and cook, stirring, until mixture comes to a full rolling boil. Add lemon juice and stir. Serve in bowls.

Chicken with cinnamon-raisin sauce Serves 4

Calories 370, Fat 13, Poly 0/5, Sat 4, Carbohydrate 12, Sugar 9, Fiber 2, Protein 54

2 Tsp. olive oil
1/2 cup chopped onion
3/4 Tsp. cinnamon
1/8 Tsp. fresh ground pepper
3 cloves garlic, minced
4 boneless chicken breast halves (6 oz each)
1 Tbs. lemon juice
1/4 cup raisins

Heat olive oil briefly in large skillet; add onion, cinnamon, pepper and garlic. Cook over medium-high heat for 3-4 minutes, stirring frequently to prevent sticking. Add chicken and cook about 5 minutes on each side.

Add lemon juice and raisins, cover, and simmer over low heat about 10 minutes more. When chicken is done, serve chicken with some of the onion-raisin mixture spooned on top.

Habañero chicken Serves 4

1 cup diced onion
3 scallions, green and white parts, chopped
2 Tbs. Fresh thyme leaves, or 2 Tsp. Dried
1 Tbs. Coarsely chopped gingerroot
2 Habañero Chile peppers or ½ Tsp. Red pepper
1 Tbs. olive oil
1 Tsp. Ground allspice
½ Tsp. Freshly ground black pepper
½ Tsp. Ground cinnamon
¼ Tsp. Freshly ground nutmeg
½ Tsp. Salt
2 chicken breasts, split and skinned

Preheat the oven to 300 F. In a blender, combine the onion, scallion, thyme, ginger, chiles or red pepper, oil, allspice, pepper, cinnamon, nutmeg and salt. Process to a pulpy paste. There will be about a cup. Spread the paste liberally over the chicken breasts. Place the chicken in a baking dish, cover and bake 45 minutes or until chicken is done.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Chicken stew Serves 4
Calories 304, Fat 12, Poly 0/3, Sat 3, Carbohydrate 13, Sugar 3, Fiber 2, Protein 36

4 (4-ounce) skinned, boned organic chicken breast halves
2 Tbs. olive oil
1 cup thinly sliced green onions
½ cup sliced onion
4 cloves garlic, minced
2-14.5 oz cans diced tomatoes with Italian herbs
1 cup dry white wine
1 bay leaf
1 Tsp. dried whole thyme
½ Tsp. fennel seeds, crushed
¼ Tsp. salt
1/8 Tsp. saffron powder (optional)
Dash of ground red pepper
Freshly ground pepper (optional)

Heat olive oil in a pot over medium-high heat until hot. Add onions and garlic; sauté until onion is tender. Add chicken, diced tomatoes with Italian herbs, wine, and bay leaf to onion mixture, stirring well to combine. Add thyme, fennel seeds, salt, saffron, and red pepper and bring to boil stirring well.

Reduce heat, cover, and simmer 20-25 minutes or until done. Remove and discard bay leaf. Ladle stew into individual bowls, and garnish with freshly ground pepper, if desired.

Chicken stir-fry Serves 2 (360/13/54/6-2-4/5-0/120)

12 oz Chicken breast cut into 1/2-inch-wide strips
1 Tbs. olive oil
1 medium onion, sliced
1 clove garlic, minced
1 Tsp. curry powder
½ Tsp. salt
½ Tsp. dried thyme
1/8 Tsp. ground red pepper
2 Tbs. chopped fresh parsley

Add olive oil and chicken to skillet. Stir-fry over medium-high heat for 3 minutes or until lightly browned. Add onion and garlic; stir-fry 3 minutes or until tender. Add curry powder and next 4 ingredients; stir well. Reduce heat. Simmer for 10-15 minutes or until tender. Spoon into bowls and sprinkle with parsley.

BEEF AND LAMB

Filet mignon (or other lean steak) with sautéed onions Serves1 plus 1 breakfast
(338/27/48/6-2-4/3-0/130)

8 oz filet mignon
1 medium onion, sliced
½ pound mushrooms, sliced
1 Tbs. Organic butter
Salt and pepper to taste

Heat heavy skillet until hot. Add butter, mushrooms and onion and sauté until limp (1-2 minutes). Add filet and sear the first side until brown (1-2 minutes). Turn and sear second side as the first. Cover and turn off heat. Let sit for 3-5 minutes. The steak will be rare or medium rare, depending on the thickness. You may cook longer if you desire.

Broiled lamb kebobs Serves 4
Calories 350, Fat 19, Mono 8, Poly 0/3, Sat 8, Carbohydrate 8, Sugar 2, Fiber 3, Protein 36

1 lb. Boneless lamb loin
2 Tbs. olive oil
2 Tbs. Lemon juice
1 Tsp. Oregano
Salt and freshly ground pepper to taste
8 small onions, peeled
1 small red pepper
1 small yellow or green pepper

Cut the lamb into 1-inch cubes. Place the cubes in a glass dish and sprinkle with lemon juice, oregano, and salt and pepper to taste. Peel the onions and sauté the whole onions in olive oil 10 to 15 minutes or until almost tender. Seed the peppers and cut them into 1 1/2-inch pieces.

Thread the lamb alternating with vegetables onto flat-bladed metal skewers or wooden skewers that have been soaked in water.

Preheat the broiler. Place the skewers on a broiling pan and cook about 5 inches from the heat, turning every 3 to 4 minutes, for 12 minutes or until meat is brown outside but still pink inside.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Beef and mushroom stew Serves 4 (293/17/18/10-2-7/0-0/125)

1 ½ pounds lean boneless organic steak
2 Tbs. olive oil
1 large onion, sliced
1 clove garlic, minced
¾ cups water
1 Tbs. chopped fresh oregano
1 Tsp. chopped fresh parsley
1 Tsp. chopped fresh basil
1 beef-flavored bouillon
½ Tsp. cracked pepper
8 oz sliced fresh mushrooms
¼ pound snow pea pods, trimmed and cut into 1-inch pieces

Trim fat from boneless steak, and cut steak into 1-inch pieces. Add olive oil to pot; place over medium-high heat until hot. Add steak pieces; sauté until browned on all sides, stirring frequently. Add onion and garlic; sauté until onion is tender. Stir in water, oregano, parsley, and basil. Add bouillon and pepper, stirring well. Bring to a boil; cover, reduce heat, and simmer 30-60 minutes. Add mushrooms; cover and cook 10 minutes. Add snow peas; cover and cook an additional 5 minutes or until crisp- tender.

To serve, ladle beef stew into individual serving bowls.

Italian pot roast Serves 2 plus 2 lunches (600/46/60/12-5-7/0-0/180)

1 lb. organic beef roast cut into 2-inch cubes
¼ lb. Hot organic Italian sausage
1 medium onion, chopped
3 garlic cloves, pressed
2 carrots cut into 1 inch pieces
4 celery stalks, cut into 1 inch pieces
1 red pepper, chopped
12 mushrooms, sliced
2 Tbs. fresh chopped parsley
½ Tsp. thyme
½ Tsp. oregano
1 Tsp. basil
½ Tsp. cayenne pepper
1/8-Tsp. fennel seeds
2 Tbs. olive oil
1 Tbs. organic butter
2 Tbs. organic heavy cream
1 cup water

Heat olive oil and butter in large pot. Sauté beef and sausage for 5 minutes or until browned. Add onion and garlic and sauté for additional 5 minutes. Add remaining ingredients, bring to boil, cover and reduce heat and simmer for 1-1/2 to 2 hours or until beef is tender. Serve in bowls.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Calabrian beef stew Serves 4

Calories 253, Fat 17, Mono 5, Poly 1/5, Sat 6, Carbohydrate 7, Sugar 3, Fiber 2, Protein 18

1 ½ pounds lean boneless organic round steak (1/2-inch thick)
2 Tbs. olive oil
1 large onion, sliced
1 clove garlic, minced
¾ cups water
½ cup balsamic vinegar
1 Tbs. chopped fresh oregano
1 Tsp. chopped fresh parsley
1 Tsp. chopped fresh basil
2 Tsp. beef-flavored bouillon granules
½ Tsp. cracked pepper
2 medium-size sweet red peppers cut into 1-inch pieces
2 medium-size sweet yellow peppers, cut into 1-inch pieces
1 cup sliced fresh mushrooms
¼ pound snow pea pods, trimmed and cut into 1-inch pieces

Trim fat from boneless round steak, and cut steak into 1-inch pieces. Add olive oil to pot; place over medium-high heat until hot. Add steak pieces; sauté until browned on all sides, stirring frequently. Add onion and garlic; sauté until onion is tender. Stir in water, vinegar, oregano, parsley, and basil. Add bouillon granules and pepper, stirring well. Bring to a boil; cover, reduce heat, and simmer 1 hour. Add pepper pieces and mushrooms; cover and cook 10 minutes. Add snow peas; cover and cook an additional 5 minutes or until crisp- tender.

To serve, ladle beef stew into individual serving bowls.

Asparagus with lemon Serves 2 (60/0/6/12-4-8/0)

14 spears of asparagus
1 Tsp. butter
1 Tbs. water
1 Tbs. lemon juice

Place all ingredients in skillet and heat to steaming. Cover and simmer on low for 4-6 minutes. Remove from heat and serve immediately on a warm plate.

Sautéed sweet peppers, leeks and rosemary Serves 2

4 small leeks
1 small green zucchini (summer squash)
2 sweet peppers (red, yellow)
1 sprig fresh rosemary or 1 Tsp. dried
2 Tbs. olive oil
Salt and pepper

Trim all but 1-inch of green from leeks; wash under cold water. In saucepan of boiling water, cook leeks for 5 minutes or until tender and then drain.
Cut zucchini into 1/2-inch thick diagonal slices. Clean peppers and cut into strips. Remove leaves from rosemary. Sauté peppers, zucchini, leeks and rosemary in olive oil over medium heat stirring occasionally, for 5 to 10 minutes or until tender. Season with salt and pepper to taste. Arrange on warm serving platter.

Greens with garlic and olive oil or other fat Serves 2

2 Tbs. extra-virgin olive oil
1 small leek, white part only, sliced
3 scallions, chopped, green and white parts
2 large cloves garlic, crushed in press
3 cups chopped kale from garden
3 cups chopped broccoli rape or 10-oz package frozen, defrosted
2 cups collards cut in 1/2-inch ribbons or 10-oz package frozen, defrosted
3 cups fresh spinach or 10-oz. Package frozen, defrosted
½ cup water
Freshly ground pepper to taste

Heat the oil in a large skillet over medium-high heat. Add the leek, scallions and garlic. Sauté until the leeks are limp, about 4 minutes. Add the kale, broccoli rape, and collards, stirring until they are wilted. Mix in the spinach. Add the water and simmer until the greens are tender, about 5-10 minutes, stirring occasionally, season to taste with salt and pepper. Remove from heat and add olive oil and stir to mix. Serve immediately.

California style broccoli with grape seed oil mayonnaise Serves 2
(175/11/9/12-6-6/3-0/0)
1 lb. broccoli (12 spears)
2 Tbs. grape seed oil mayonnaise

Steam broccoli for 3-5 minutes. Serve immediately with topping of mayonnaise.

Zucchini and onion sautéed Serves 2
4 small zucchini, sliced 1/4 inch thick
1 medium onion, sliced into 1/4 inch wedges
3 Tbs. olive oil
1 clove garlic, crushed in a press
1/4 Tsp. red and black pepper

Add olive oil to skillet; cook the zucchini and onion over medium heat. Add the remaining ingredients and cook on low heat for 3 minutes or until the zucchini has reached a desired tenderness.

Cauliflower with ginger Serves 2
1 small head cauliflower, chopped into 1 to 1 1/2-inch florets (about 4 cups)
1/4 cup hot water
2 Tbs. light olive oil
1/2 Tsp. cumin
1 Tbs. fresh gingerroot, minced
1/2 Tsp. turmeric
2 Tsp. lemon juice
1 Tbs. fresh coriander leaves, chopped

Heat a large skillet over medium-high heat about 30 seconds; add oil and heat another 30 seconds. Add cumin, ginger and turmeric and stir to mix, then immediately add cauliflower and stir again to distribute spices. Add water, reduce heat, cover and cook until the cauliflower is crisp-tender (about 10 minutes). Stir gently once part way through cooking. When cauliflower is almost ready, remove cover, increase heat to medium and gently stir-fry to evaporate any moisture and lightly brown cauliflower. Add lemon juice and chopped coriander, toss lightly and serve immediately.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Sprout and snow pea stir-fry Serves 2

4 cups snow peas (8 oz)
1 Tsp. Toasted Sesame oil
2 Tsp. minced garlic
2 Tbs. minced gingerroot
2 cups bean sprouts (4-oz/125 g)
3 Tbs. water (optional)
2 Tsp. soy sauce

Remove stem end and string from snow peas. In large nonstick skillet or wok, heat oil over high heat. Add garlic, gingerroot and snow peas; stir-fry for 1 minute. Add bean sprouts; stir-fry for 1 minute or until vegetables are tender-crisp. Stir in soy sauce.

Roasted vegetables Serves 2

3 Tbs. Balsamic or red wine vinegar
2 Tbs. olive oil
1/4-cup fresh basil, chopped or 1 Tbs. dried
1 small eggplant, sliced into thin rounds
1 zucchini, thinly sliced
1 yellow summer squash, thinly sliced
1 red bell pepper, seeded and sliced thinly
1 small red onion, sliced and separated

Preheat oven to 450 degrees. Blend vinegar, oil and basil. Add vegetables, tossing to coat. Place vegetables in roasting pan and cook, stirring occasionally, until tender and lightly browned – about 30 minutes. Cool vegetables.

Brussel sprouts, steamed with olive oil, red and black pepper (garlic optional)

Serves 2

Calories 200, Fat 14, Poly 0/2, Sat 2, Carbohydrate 10, Sugar 5, Fiber 5, Protein 6

12 oz frozen or fresh Brussel sprouts
2 Tbs. olive oil
Red and black pepper to taste
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the Brussel sprouts (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 12-15 minutes or until cooked). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Spinach, steamed with olive oil, red and black pepper, and soy sauce (garlic optional)
Serves 2
Calories 170, Fat 14, Mono 10, Poly 0/2, Sat 2, Carbohydrate 4, Sugar 1, Fiber 3, Protein 4
12 oz of frozen or fresh spinach
2 Tbs. olive oil
Red and black pepper to taste
1 Tbs. soy sauce
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the spinach (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 8-10 minutes or until limp). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Collard Greens, steamed with olive oil, red and black pepper, and soy sauce (garlic optional) Serves 2
Calories 170, Fat 14, Mono 10, Poly 0/2, Sat 2, Carbohydrate 4, Sugar 1, Fiber 3, Protein 4
12 oz of frozen or fresh collard greens
2 Tbs. olive oil
Red and black pepper to taste
1Tbs. soy sauce
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the greens (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 8-10 minutes or until limp). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Broccoli, steamed with olive oil, red and black pepper, and soy sauce (garlic optional)
Serves 2
Calories 180, Fat 14, Mono 10, Poly 0/2, Sat 2, Carbohydrate 8, Sugar 2, Fiber 4, Protein 6
12 oz of frozen or fresh broccoli
2 Tbs. olive oil
Red and black pepper to taste
1Tbs. soy sauce
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the broccoli (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 8-10 minutes). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Mixed Winter Vegetables, steamed with olive oil, red and black pepper, and soy sauce (garlic optional) Serves 2
Calories 180, Fat 14, Poly 0/2, Sat 2, Carbohydrate 10, Sugar 4, Fiber 4, Protein 4

12 oz of frozen or fresh mixed winter vegetables (broccoli, cauliflower, carrots)
2 Tbs. olive oil
Red and black pepper to taste
1 Tbs. soy sauce
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the vegetables (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 8-10 minutes). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Cauliflower, steamed with olive oil, garlic, red and black pepper, and soy sauce Serves 2
Calories 180, Fat 14, Poly 0/2, Sat 2, Carbohydrate 10, Sugar 2, Fiber 4, Protein 6

12 oz of frozen or fresh cauliflower
2 Tbs. olive oil
Red and black pepper to taste
1Tbs. soy sauce
1 clove garlic, pressed (optional)

Bring ¼ cup water to boil in a medium saucepan. Add the cauliflower (and garlic if desired) and steam at medium heat for 3-5 minutes or until warm (if using fresh, steam for 8-10 minutes). Remove from heat and add remaining ingredients stirring well. Serve immediately.

Black-eyed peas with garlic and kale Serves 2
Calories 290, Fat 14, Poly 0/2, Sat 2, Carbohydrate 22, Sugar 4, Fiber 9, Protein 12

12 oz kale (4 cups), washed and drained
2 Tbs. olive oil
1 clove garlic, pressed
Pinch of dried red pepper
1 cup canned or cooked black-eyed peas
1 Tbs. cider vinegar, or to taste

Pull the kale leaves from the stems (discard stems) and chop the leaves into one inch pieces. Place about one inch of water in a large pot and heat to boiling. Add the kale, cover and cook until tender, stirring occasionally, 5 to 10 minutes. Drain. Reserve the water for soup, if desired. In a large non-stick skillet, combine the oil and garlic. Cook the garlic over low heat, stirring, until it begins to sizzle, about two minutes. Add the peas and red pepper and cook until blended, stirring, about three minutes. Add the kale and stir to blend over low heat. Add the cider vinegar just before serving. Serve hot or at room temperature.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Okra with stewed tomatoes Serves 2

2 Tbs. olive oil
1/2 cup coarsely chopped onion
1 cup (about 1/4 pound) fresh (or frozen) okra cut in 3/4-inch pieces
8 oz. can stewed tomatoes
Freshly ground pepper to taste

In a deep saucepan, heat the oil over medium high heat. Sauté the onion until it softens, about 4 minutes. Add the okra and sauté 3 to 4 minutes, until it turns bright green. Add the tomatoes, bring to a boil, reduce the heat, and simmer until the okra is crisp-tender, about 5 minutes. Season to taste with pepper. Serve immediately.

Turkey and avocado lettuce wrap Serves 1

1 large leaf Romaine lettuce
2 oz. thinly sliced turkey breast
2 Tbs. chunky salsa, well drained
1 Tsp. minced cilantro
2 1/2-inch wedges avocado

Lay the Romaine lettuce leaf on a cutting board. Cover half with sliced turkey. Spread the salsa over the turkey. Sprinkle with cilantro. Place the avocado wedges across the turkey. Fold the lettuce up over the avocado. Eat carefully over plate.

SOUPS

Miso soup Serves 2

3 cups spring or filtered water
3/4 to 1 ½ Tsp. brown rice Miso
3 (1 inch) pieces wakame or other seaweed cut up
Green onions, thinly sliced
Several pieces each of a few vegetables such as:-onion slices-daikon matchsticks-carrot rounds-finely shredded
Chinese cabbage or head cabbage-diced
winter squash

Add all ingredients except Miso to water and heat to boiling. Reduce heat and simmer 3-5 minutes. Remove from heat and allow cooling for 1-2 minutes, then add Miso and serve.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Hearty salmon chowder Serves 2

1 can (7 1/2 oz.) salmon
1 Tbs. olive oil
1/2 cup each chopped onion and celery
1/4 chopped sweet green pepper
1 clove garlic, minced
1 cup diced carrots
1 cup each chicken stock and water
1/2 Tsp. each coarse pepper and dill seed
2 cup diced zucchini
Pepper
1/2 cup chopped fresh parsley (optional)

Drain and flake salmon, reserving liquid. In large nonstick saucepan, heat olive oil over medium heat; cook onion, celery, green pepper and garlic, stirring often, for 5 minutes or until vegetables are tender.

Add carrots, chicken stock, water, pepper and dill seed; bring to boil. Reduce heat, cover and simmer for 20 minutes or until vegetables are tender. Add zucchini; simmer, covered, for 5 minutes.

Add salmon, reserving liquid, and pepper to taste. Cook over low heat just until heated through. Just before serving, add parsley.

Cabbage soup Serves 4

1 Tbs. canola oil
2 medium onions, chopped
1 medium carrot, grated
1 medium leek, white part only, chopped
1/3 small head cabbage, quartered and sliced crosswise into 1/2-inch strips, about 6 cups
4 cups vegetable stock or canned broth
1/2 cup oatmeal, steel-cut or old-fashioned
1 Tsp. dried thyme
1/2 Tsp. sugar
1 bay leaf
1/2 Tsp. salt
Freshly ground pepper

Heat the oil in a large Dutch oven or saucepan over medium-high heat. Add the onion, carrot and leek and stir to coat with the oil. Cover the pot tightly, reduce the heat to medium, and cook the vegetables for 10 minutes. Mix in the cabbage, cover the pot, and cook for another 10 minutes, until the cabbage is wilted.

Stir in the tomatoes, stock, oatmeal, thyme, sugar, bay leaf and salt. Season the soup to taste with pepper and simmer, uncovered, until the oatmeal is cooked and the cabbage is tender. This should take about 30 minutes if using steel-cut oats, and 20 minutes if using rolled oats. Serve, or cool and refrigerate overnight. When reheating, to regain a soup-like consistency, you may want to add some vegetable broth.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Irish lamb soup Serves 2 (470/26/44/9-5-4/2-0/135)

2 Tbs. olive oil
1 pound boneless lean lamb leg cut into 1-inch cubes
3 cups water
1 beef bouillon cube
½ head cabbage, coarsely chopped
3 carrots, chopped
1 medium onion, chopped
1 Tsp. dried thyme
1/4 Tsp. garlic powder
1/4 Tsp. ground allspice
1/4 Tsp. pepper
1 bay leaf

Heat olive oil in large pot over medium-high until hot. Add lamb; cook 5 minutes or until browned. Add water and remaining ingredients; bring to a boil. Cover, reduce heat, and simmer 20 minutes or until the lamb is tender, stirring occasionally. Discard bay leaf.

SALADS Green Leafy/Vegetarian

Renaissance Greek salad Serves 2 (600/50/18/20-6-14/2-0/44)

4 cups (6 oz) mixed greens or lettuce
12 mushrooms, quartered
1 large tomato, chopped
1 green pepper, chopped
¼ Bermuda onion, thinly sliced
10 black olives (pitted or non-pitted)
½ cucumber, sliced thinly
4 oz. Feta (goat) cheese, crumbled
¼ cup olive oil
1 Tbs. lemon juice
1 Tbs. rice vinegar
½ Tsp. oregano leaves
Salt and pepper to taste
Optional: 1 small can of anchovies

Mix salad ingredients and serve in large shallow bowls. Combine olive oil, vinegar and lemon juice; pour over salad and toss. Place anchovies as desired on salads. You may also have decanters of olive oil and rice vinegar on the table for individuals to serve themselves in addition. Salt and ground pepper to taste. (Is this as good as it gets? I think so!)

Curried salad Serves 4

1 Tbs. curry powder
2 Tbs. extra-virgin olive oil
1 carrot cut in 1/2-inch dice
1 small onion cut in 1/2-inch dice
1 small tomato seeded and cut in 1/2-inch dice
1 zucchini cut in 1/2-inch dice
1/4 cup dried currants
½ cup canned chickpeas
2 Tbs. fresh lemon juice
Salt and freshly ground pepper to taste

Briefly sauté in olive oil the carrot, onion, tomato, zucchini, currants and chickpeas. In a small bowl, combine the lemon juice, salt and pepper, and 1 Tbs. of olive oil. Pour the contents of the bowl over the salad. Toss until all the ingredients are combined. Season to taste with salt. Serve warm or at room temperature.

Spinach and red cabbage salad Serves 2

5 oz. Packed spinach leaves
8 oz. Grated red cabbage

Wash spinach; discard tough ends and tear large leaves into 2 or 3 pieces. Just before serving, toss spinach with cabbage and dressing (see recipe listed next).

Nobel Prize winning vinaigrette Serves 2 (140/14/0/2-0-2/2-0/0)

2 Tbs. olive oil
2 Tbs. Rice vinegar
2 fresh basil leaves; chopped or 1 Tsp. dried basil
½ dried tarragon
½ Tsp. Dried mustard
¼ Tsp. Sea salt
Ground pepper to taste

Black bean salad Serves 4

1 cup canned black beans, rinsed and drained
1/2 cup papaya, peeled, seeded and diced
2 Tbs. Red bell pepper, minced
2 Tbs. Green bell pepper, minced
1 scallion, sliced thinly
1 Tsp. Fresh chili, finely chopped
2 Tbs. Fresh lime juice
2 Tsp. Vegetable oil

Combine all ingredients and toss to blend. If desired, chill before serving.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Piquant vegetable salad Serves 4

1 cup cauliflower, chopped
2 cups broccoli, chopped
1 red pepper, chopped
15-ounce can chickpeas, drained and rinsed
3-4 scallions, chopped
2 Tbs. lemon juice
2 Tbs. red wine (or cider) vinegar
1 clove garlic, finely chopped (or 1/8 Tsp. garlic powder)
2 Tsp. Dijon-style mustard
1 Tsp. sugar

If desired, steam cauliflower and broccoli very briefly to blanch. Do not cook completely. Immediately run under cold water to stop cooking process.

Combine cauliflower and broccoli in large bowl with other vegetables. Cover and chill until serving time. In small bowl, stir together lemon juice, vinegar, garlic, mustard, and sugar. Blend thoroughly, cover, and chill until serving time.

Cucumber salad Serves 4

2 cups cucumbers, cut in half lengthwise, seeded and chopped
1 cup sweet red pepper, chopped
1/2 cup carrots, grated or finely diced
1/4 cup scallions or red onion, finely chopped
2 Tsp. fresh ginger, peeled and minced
1 clove garlic, finely chopped
1/2 cup water
1/4 cup white vinegar

Combine all vegetables with ginger, garlic and crushed peppercorns in a medium or large bowl. Add vinegar and mix thoroughly. Cover and refrigerate at least 30 minutes before serving. Best if prepared a day ahead.

SALADS **Meat/Fish/Poultry**

Shrimp salad Serves 2 (220/11/24/4-2-2/5-1/173)

2 cups cooked shrimp (8 oz)
2 Tbs. grapeseed or canola oil mayonnaise
2 Tsp. capers
1 stalk celery, chopped
1 Tbs. lemon juice
Freshly ground black pepper

Cut the shrimp into bite-size pieces. Place in a bowl. Add mayonnaise, capers and celery. Sprinkle lemon juice and pepper to taste over the salad. Stir to coat shrimp and blend ingredients. Serve on lettuce leaves.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Salmon salad Serves 2 with ½ cup each (288/21/21/3-2-1/4-3/60)

7.5 oz can of salmon-boneless
2 Tbs. grapeseed or canola oil mayonnaise
2 celery stalks, finely chopped
Salt and pepper to taste
Optional: 1 Tbs. chopped onion

Mix all ingredients together. May serve with mixed green salad.

Helen of Troy Salad of Tuna Serves 1 (228/11/31/3-2-1/3-1/37)

6 oz can of solid white tuna, drained
1 Tbs. grape seed oil mayonnaise
½ Tsp. fresh dill or ¼ Tsp. dried dill
1 celery stalk, finely chopped
Salt and pepper to taste
Optional: 1 Tbs. chopped onion

Mix all ingredients together. May serve with mixed green salad.

Mexican chicken salad Serves 2

1 cup thinly sliced white daikon
2 cups (about 8 oz.) diced cooked chicken breast
1/2 cup thin cucumber slices, halved into crescents
1/4 cup thinly sliced red onion, in crescents
2 Tbs. olive oil
1/4 cup freshly squeezed orange juice
2 Tbs. freshly squeezed lime juice
1 Tsp. salt
4 cups romaine lettuce, torn in 2-inch pieces
1/4 Tsp. (round) chili powder or 3 to 4 dashes hot pepper sauce
2 Tbs. coarsely chopped cilantro

Place cut up daikon in a large glass bowl. Add the chicken. Add the cucumber and onion. In a small bowl, whisk together the oil, orange and lime juices, and salt. Mix until blended. If using hot sauce, add it at this point. Pour the dressing over the chicken salad and toss to blend.

Arrange 1 cup of the lettuce on each of four salad plates. Heap a quarter of the chicken salad on each plate. Sprinkle with the chili powder and the cilantro. Serve immediately. This salad is best when freshly made, but it can keep about an hour; after that the citrus flavors fade.

Tamari tuna salad Serves 1 (228/11/31/3-2-1/3-1)

6 oz can of solid white tuna, drained
1 Tbs. Grapeseed or canola oil mayonnaise
1 celery stalk, finely chopped
½ Tsp. Tamari sauce
Salt and pepper to taste

Mix all ingredients together. May serve with mixed green salad.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Curried chicken salad Serves 2 (206/18/31/5-2-3/4-0)

1 lb. boiled chicken or turkey breast
1 Tbs. grapeseed or canola oil mayonnaise
½ Tbs. seasoned rice vinegar
1 Tsp. lemon juice
2 celery stalks- finely chopped
1 Tsp. curry powder
Salt and pepper to taste
Optional: 1 Tbs. chopped onion

Mix all ingredients together. May serve with mixed green salad.

Call me Ishmael's chicken/turkey salad Serves 2 with ½ cup each (206/18/31/5-2-3/4-0/80)

½ lb. boiled chicken or turkey breast
1 Tbs. grapeseed or canola oil mayonnaise
1 Tbs. organic heavy cream
½ Tbs. seasoned rice vinegar
1 Tsp. lemon juice
2 celery stalks- finely chopped
Salt and pepper to taste
Optional: 1 Tbs. chopped onion

Mix all ingredients together. May serve with mixed green salad.

VEGETARIAN ENTREES

Vegetarians are giving their life back to the earth by not consuming animals. I agree it would be better if we did not have to kill to live, but the consumption of fish and other meat/poultry promotes greater health through essential oils, proteins and vitamins. I believe we are designed to be omnivores living on healthy oils, green leafy vegetables, fish/poultry/meat as well as nuts, seeds and fruit (in about that order). But for those individuals who prefer to not sacrifice animals, here are some reasonably healthy alternatives.

Brisk lentil and Brussel sprout stew Serves 4

1 cup dried lentils
2 cups Brussel sprouts, quartered
1 carrot, diced
1 cup winter squash, cubed
2 bay leaves
3 cups water
Dash of soy sauce
2 Tsp. brown rice Miso or soy sauce
¼ cup minced fresh parsley

Add first 7 ingredients to a large pot, bring to boil and then reduce heat to low simmer for 30 minutes or until lentils are tender. Remove from heat; add Miso or soy sauce and parsley and serve.

Lentil Dahl Serves 4

1 cup dried lentils
3 cups water
3 peeled tomatoes, diced (11 oz can or fresh) with juice
1 carrot, diced
¼ cup olive oil
1 Tsp. curry powder
½ Tsp. cumin
1 clove garlic, pressed
Salt and pepper to taste

Bring water with lentils to boil, then add tomatoes, carrots, olive oil, curry powder, pressed garlic, salt and pepper. Reduce heat and simmer for 30 minutes or until lentils are tender. Serve with brown rice.

Ratatouille Serves 4 **(avoid if you have arthritis? –all "nightshade" vegetables)**

1 medium eggplant, diced
2 zucchini cut up
3 peeled tomatoes, diced (fresh or 11 oz can)
6 mushrooms, sliced (fresh or 5-7 oz can)
2 cloves garlic, pressed
1 small onion, sliced
1 Tsp. basil
½ cup olive oil
Salt and pepper to taste
2 fennel seeds (optional)

Sauté eggplant in ½ cup of olive oil. Add zucchini, tomatoes, mushrooms, garlic, onion, basil, water, (and fennel). Bring to boil and simmer for 20-30 minutes on low. Add salt and pepper to taste.

Mexican black bean with wild rice Serves 4

¼ cup olive oil
1 medium onion, chopped
1 green pepper, chopped
6 oz wild rice (dry weight) cooked
½ Tsp. cumin
¼ Tsp. red pepper
1/8 Tsp. coriander
Black beans (15 oz can, drained and rinsed)
3 peeled tomatoes, diced (fresh or 14.5 oz can)

Cook wild rice. Sauté onion, green pepper until tender. Add rice and remaining ingredients and heat thoroughly.

Vegetable jubilee (Pasta primavera without the pasta) Serves 4

10 asparagus spears cut into 1inch pieces
Broccoli flowerets from one head
½ cup snow pea pods
1 yellow squash, sliced
1 zucchini, sliced
5 oz mushrooms, sliced
1 clove garlic, pressed
1/3 cup olive oil
1 Tbs. fresh parsley
1 Tbs. fresh basil
1/3 cup water
6 oz wild rice, cooked
Salt and pepper to taste

Sauté first 7 ingredients for 5 minutes in olive oil, stirring frequently. Add cooked wild rice, parsley, basil, salt, pepper, and water, and heat an additional 2-3 minutes. Serve immediately.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Greek rice pilaf Serves 4

1/3 cup olive oil
1 small onion, chopped
1 cup long grain rice
2 cups water
2 Tsp. brown rice Miso or soy sauce
½ Tsp. thyme
¼ Tsp. oregano
2 cucumbers, diced
1/3 cup crumbled Feta cheese
1 Tbs. diced pimento

Sauté onion and rice in olive oil until brown. Add water, spices, and Miso or soy sauce and bring to boil. Reduce heat and simmer for 15 minutes or until rice is tender and liquid absorbed. Remove from heat and stir in cucumber, Feta cheese and pimento. Serve immediately.

Broccoli quiche (with eggs) Serves 4

Calories 136, Fat 8, Mono 4, Poly 1/1, Sat 2, Carbohydrate 4, Sugar 1, Fiber 2, Protein 12

1 Tbs. olive oil
1 cup chopped fresh broccoli
½ cup finely chopped sweet red pepper
¼ cup finely chopped onion
¼ cup water
4 large eggs, lightly beaten
½ cup almond milk
½ Tsp. salt
¼ Tsp. dry mustard
¼ Tsp. ground red pepper

Combine broccoli, sweet red pepper, onion, and olive oil in a medium saucepan. Cover and cook over medium heat 3 to 5 minutes or until vegetables are crisp-tender. Combine vegetable mixture, beaten eggs and next 5 ingredients in a large bowl, stirring well. Pour mixture into a 9-inch quiche dish coated with olive oil. Bake at 350° for 35 to 40 minutes or until set. Let stand 10 minutes before slicing into wedges.

Calories / Fat / Protein / Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

Dessert

Strawberry smoothie Serves 2 (140/9/6/13-7-6/2-3/0)

1 cup frozen strawberries
15 almonds
1 cup filtered water
½ Tsp. vanilla
(1 pack of Stevia)

Place the nuts in the blender and blend until chopped into fine pieces. Add the water and blend on high, adding the strawberries one at a time. Blend for 2-3 minutes or until thick. Pour immediately into two bowls and enjoy.

Blueberry smoothie Serves 2 (157/9/6/18-8-10/2-3/0)

1 cup frozen blueberries
15 almonds
1 cup filtered water
½ Tsp. vanilla
(1 pack of Stevia)

Place nuts in blender and blend until chopped into fine pieces. Add the water and blend on high while adding the blueberries. Blend for 2-3 minutes or until thick. Pour immediately into two bowls and enjoy.

Fresh berries with heavy cream and brandy Serves 2 (116/5/2/15-6-9/0/15)

½ cup fresh blueberries
½ cup fresh raspberries
1 cup fresh strawberries, halved
2 Tbs. organic heavy cream
2 Tsp. Brandy

Mix berries and distribute evenly into two shallow bowls. Pour 1 Tbs. of cream followed by 1 Tsp. Brandy on fruit.

8 Fresh Strawberries (25/0/1/5-2-3/0/0)

1 Kiwi, sliced (46/0/1/11-3-8/0/0)

Raspberries ½ cup (fresh or frozen) **with 1 Tbs. heavy cream** (88/6/1/9-4-5/0/21)

½ cup Blueberries (fresh or frozen) (42/0/1/10-3-7/0/0)

The *On A Tight Budget* Approach

My suggestion to all who have the option of following the "Money is No Object" approach is to try to incorporate as many of those changes as possible (although it will cost significantly more). Sometimes money is tight but we still want to feel well. I will first present an approach that will greatly improve health without breaking the bank.

The important substitutions are as follows:

- Conventionally grown food instead of *organic, free range, or organic* food
- Peanuts instead of almonds, walnuts, brazil nuts and cashews
- Peanut butter instead of almond butter, cashew butter, tahini
- Frozen vegetables instead of fresh vegetables
- Hamburger and pot roast instead of expensive cuts of meat
- Regular store-bought chicken instead of *free range, organic* chicken
- Chicken thighs and legs instead of chicken breasts
- Cans of tuna instead of fresh wild salmon
- Cans of tuna instead of cans of salmon, kippers or sardines
- The addition of cheese and cottage cheese (unless you have allergies or asthma)- TRY TO AVOID
- Grapes and apples instead of strawberries, blueberries, raspberries, blackberries
- Frozen strawberries and blueberries instead of fresh strawberries and blueberries (I frequently buy frozen fruits and vegetables for convenience)

Important purchases which must be made:

- Light olive oil (the large can), hopefully on sale for about $10. Tastes good (very mild)
- Chromium supplement 200mcg per day (twice that for people with diabetes)
- MSM 3000mg per day (try it to see if it helps joint pains, allergies and energy level)
- Magnesium 250mg and Calcium 500mg with vitamin D, each once or twice daily
- Omega-3 oils (either Cod liver oil: 1 Tbs. per day) or the capsules 2-4 per day

Breakfasts:

2 eggs over-easy cooked in 1Tbs. olive oil, then add 2 Tbs. salsa in the pan and heat.

2 eggs any style with sautéed green pepper and onion

Peanut butter (2 Tbs.) on celery (or spoon)

Leftovers-Chunks of beef from Stew (4 pieces-2 oz)

Italian Sausage (7 oz- 2 sausages) heated in a pan with a little water and olive oil

1/3 cup rolled oats, 1/3-cup oat bran cooked with ¾ cup water for 5 minutes.

1 cup Cottage Cheese with fruit (if no asthma or allergies)

Oat waffles with strawberries (and whipped cream?)

Lunches:

Chicken Salad (½ to 1 cup), 1 oz peanuts

Tuna salad (½ to 1 cup), 1 oz peanuts

Tuna 5 oz can

Sardines 1 can

Leftover chicken, beef or pork with vegetables

Snacks:

Several handfuls of peanuts (1-2 oz of shelled peanuts)
Get the unshelled peanuts; they last longer and are more enjoyable
(Never go anywhere without your peanuts; you may want something healthy to eat)

Turkey Jerky (1-2 oz)

Beef Jerky (1-2 oz)

1-2 ounces of cheese (if no asthma or allergies)

(But **NO** sodas, candy, bagels, donuts, cookies, cakes, popcorn, pretzels, bread, ice cream, water ice)

Suppers:

Pot Roast with vegetables

Chicken Stew with onion and celery

Deep Tuna Pie with French fried onion rings

Beef and Navy Bean Stew

Tuna Salad or Chicken Salad
(Make enough so you can take for lunch)

Chicken with mustard greens

Hamburgers (no bun) with a vegetable

Desserts:

Frozen Strawberry Smoothie

Roasted Cashews (a special occasion)

Oat waffles with strawberries (and whipped cream?)

Fresh fruit or berries (with cottage cheese?)

You have noticed I have eliminated the following foods:

- Pasta, bread, potatoes and rice
- Milk, yogurt, ice cream
- Pizza
- Spaghetti and lasagna
- Philly Cheese Steak Sandwiches (you can eat the inside but not the roll, thank you very much)

Why? Because these foods tend to make you feel tired. Then you don't exercise. Then your waist-hip ratio goes up. Then your risk of diabetes, heart disease, cancer and depression goes up.

So do not worry about your weight. But do worry about your waist.

And you must exercise 13 minutes per day (in the morning). Your heart rate during this 13 minutes must get up to 120-130 beats per minute or more (count your pulse for 10 seconds; it must be 20 or more beats). Exercise bike, climbing stairs, jogging, jumping jacks, aerobics, and swimming, whatever you can do. Just do it.

Recipes for the Tight Budget

Tuna salad Serves 4

2 cans tuna
1 medium onion, grated
4 eggs, hard boiled and chopped
½ cup celery, chopped
1 medium apple, peeled and chopped
½ cup mayonnaise or light olive oil
Salt and pepper to taste
(2 Tbs. pickle relish)

Combine all ingredients, mix well and chill. Be sure to make enough to take for lunch the next day.

Chicken salad Serves 4

1 lb. cooked chicken without bones (boiled or canned)
½ cup celery, chopped
1 medium apple, peeled and chopped
20 red or white grapes
½ cup mayonnaise or light olive oil
1 Tsp. curry powder
1 Tsp. soy sauce
(1 Tsp. lemon juice)
Salt and pepper to taste

Cut up chicken into small cubes. Combine mayonnaise (or olive oil) with curry powder, soy sauce, lemon juice, salt and pepper and stir well. Put all ingredients into a large serving bowl and mix well. Serve chilled.

Deep tuna pie Serves 4

2 large cans of tuna
1 pound green beans, fresh or frozen
1 can cream of mushroom soup
2 Tbs. olive oil
1 can French fried onion rings

Mix tuna and green beans in a casserole dish. Pour the mushroom soup over the tuna and beans. Sprinkle top with onion rings and bake at 450 degrees until top is brown (5-10 minutes).
Save some for lunch the next day. Reheat on stove or in microwave.

Pot roast Serves 4

2 pounds of inexpensive beef, cut into large cubes
4 stalks of celery, cut into 1-inch lengths
2 carrots cut into 1-inch lengths
1 medium onion, sliced
1 small can mushrooms
1 can tomatoes
¼ cup light olive oil
1/8 Tsp. dried basil
Salt and pepper to taste

Heat olive oil in a large pot. Add the beef and onion and sauté until brown. Add remaining ingredients, bring to boil, then reduce heat to low and simmer for 45-60 minutes or until beef is tender. Serve in bowls.

Save some for lunch the next day. Reheat on stove or in microwave.

Beef and navy bean stew Serves 4

2 pounds of inexpensive beef, cut into large cubes
10 oz can of navy beans, rinsed
1 cup water
4 stalks of celery, cut into 1-inch lengths
10 oz package of frozen greens (spinach, collard, turnip, kale, etc.)
1 medium onion, sliced
1/3 cup light olive oil
¼ Tsp. basil
¼ Tsp. curry powder
¼ Tsp. oregano

Heat olive oil in a large pot. Sauté beef. Add remaining ingredients and bring to boil. Reduce heat and simmer on low for 45-60 minutes or until beef is tender.

Save some for lunch the next day. Reheat on stove or in microwave.

Pan-fried chicken w/ vegetables Serves 4

2-3 Lb. Broiler-fryer chicken cut up
3 Tbs. oil (olive or canola)
1/3-cup almonds ground finely into powder
1 Tsp. paprika
1 onion sliced
1 egg

Grind almonds in blender until powdery. Place in a bowl. Beat the egg well in a second bowl. Heat the oil on high in a large heavy skillet. Dip the chicken pieces in the egg, coat with almond flour and place in skillet. Turn frequently to prevent burning for the first 2-3 minutes. Reduce heat to low, cover and let cook for an additional 5 minutes. Turn off heat and let coast for another 10 ten minutes so the chicken will be cooked through but still moist. Serve with steamed broccoli, spinach or other green vegetable to your liking.

Chicken stew Serves 4

2 Lb. Chicken cut up
2 Tbs. oil (olive or canola preferred)
½ cup sliced onion
2-14.5 oz cans diced tomatoes with Italian herbs
½ Lb. frozen zucchini
1 Tsp. dried whole thyme
½ Tsp. fennel seeds, crushed
¼ Tsp. salt
Freshly ground pepper (optional)

Heat oil in a pot over medium-high heat until hot. Add onions and sauté until onion is tender. Add chicken, diced tomatoes with Italian herbs, wine, and zucchini to onion mixture, stirring well to combine. Add thyme, fennel seeds, salt and bring to boil stirring well.

Reduce heat, cover, and simmer 20-25 minutes or until done. Ladle stew into individual bowls, and garnish with freshly ground pepper, if desired.

Tacos and salad Serves 4

1 Lb. ground beef
2 tomatoes sliced into wedges
1-16 oz jar of salsa-mild, medium or hot
Lettuce leaves washed and shredded
6 taco shells
1 onion chopped (optional)
Makings of a green salad

Cook the ground beef and onions in a skillet until brown. Drain the excess juice and then add ½ cup of salsa to the hamburger mixture and stir. Fill the taco shells with the lettuce, hamburger mix, tomato and additional salsa to taste. Enjoy 1-2 tacos as needed. Serve with a tossed green salad.

Bean burritos w/ salad Serves 4

2 cans of refried beans
8 flour tortillas
1-16 oz jar of salsa-mild, medium or hot
Cheddar cheese-grated (if no allergies)
Makings of a green salad

Preheat oven to 350 degrees. Grease a square Pyrex dish with butter or oil. Divide the refried beans among the 8 tortillas and roll the tortillas into tubes. Place in the Pyrex dishes and cover with Salsa (and grated cheese if no allergy symptoms). Bake in oven for 15-20 minutes or until hot inside.

Chinese chicken with broccoli and peanuts Serves 4

2 –3 Lb. Chicken cut up	4 oz. peanuts
1/3 cup oil (olive or canola preferred)	1 Tbs. soy sauce
1 onion sliced	1 Tsp. ginger powder (optional)
1 Lb. broccoli (fresh or frozen)	Salt and pepper to taste

Heat oil in a large heavy skillet. Add chicken and onions. Sauté for 5 minutes or until brown. Add peanuts, soy sauce, ginger powder and salt and pepper, cover and reduce heat. Simmer for 15-20 minutes. Add broccoli and cook additional 5 minutes. May serve with a green salad on the side.

Hey, isn't this just the Atkins' Diet?

What about the low-fat Ornish Diet?

How does this compare to the Protein Power Diet?

9

THE MEDITERRANEAN HUNTER-GATHERER DIET

VERSUS ORNISH, ATKINS AND PROTEIN POWER

1 How Does the Mediterranean Hunter-Gatherer Diet compare to the Diets of Dr. Ornish, Dr. Atkins, and Drs. Eades (Protein Power)?

The following pages include tables comparing these four approaches. The Protein Power plan is very similar to many of the other diets now available. These include the South Beach Diet, the Schwarzbein Principle, Sugar Busters, The Zone, and many others. There are only three very-low carbohydrate diets: the Atkins', Neanderthin, and the Mediterranean Hunter-Gatherer diet (presented in this book). It is clear that we are all trying to present the best information we have in our plans. We continue to learn more each day. The Seven Day Plan (Nutrition for Women: Men, add 50%) that I present is (I believe) the best for improvement of waist circumference, allergies and asthma, inflammatory bowel disease, arthritis, and the prevention of cancer of the colon, breast, prostate and pancreas. This is in addition to all of the benefits ascribed to the Atkins Diet in the ongoing studies at Duke and elsewhere that patients following the Atkins' Diet have greater energy, improved mood, less heartburn, and less pre-menstrual, menstrual, and menopausal problems.

(a) *The Atkins' Diet*

Dr. Steele always threatens his patients with a quiz when they return to see him. Because healing comes from within, so it just doesn't matter if the doctor knows his stuff. It only matters if the patients know their stuff! So before looking at these tables, you need to take a quiz. It is important that you understand this information, so what better way to find out how much you know than taking a quiz (to prepare you for the test of life).

The Atkins' diet quiz: are you doing the Atkins' diet correctly? Check if you are doing the critical suggestions Dr. Atkins makes in his book but may not repeat in his eating suggestions. See page 186 for the answers.

(1) When to snack? On what do you snack? How much can you have?

(2) What do you want your ratio of omega 6 to omega 3 oils to be? What are the benefits of omega 3 oils? What are good sources of omega 3 oils?

(3) How many grams of fiber should you eat per day? Which supplements are helpful for constipation?

(4) What are possible reactions to dairy products? Which component of dairy promotes allergies? Are butter and heavy cream acceptable to those with allergies?

(5) What about wheat; could keeping the wheat and corn out of your diet be beneficial in the long run?

(6) Is all of that cholesterol and saturated fat bad for you? How does Dr. Atkins suggest you check to see if you are having problems with the diet?

(7) What is metabolic resistance? Is it the same as insulin resistance? What is Syndrome X? How can you tell if you have metabolic resistance? How does that alter your diet?

(8) What is a typical serving size of meat? 4 oz, 6 oz or 8 oz?

(9) Are the calorie requirements of men and women the same? If not, how much more can a typical man eat and still lose weight?

(10) Do you really need to take all of those supplements that Dr. Atkins suggests? Which are the critical supplements; what is the absolute minimum required for success?

(11) What are Lipolysis testing strips? Is this a fancy term for the Ketostix you buy in the pharmacy?

(12) Is ketosis bad for you? We know the induction diet is ketogenic (induces a state of ketosis where you burn fat as fuel instead of carbohydrate). But Dr. Atkins tells you to only be on this diet for the first two weeks. Is the *On-going Weight Loss* diet also ketogenic?

(13) Is ketosis a bad thing? How many grams of carbohydrates are you allowed? Is it 20, 40, or 60 grams and how do you determine this? See page186 for the answer key.

(b) ***The Ornish Diet*****:** *Is your being a vegetarian the best option for the Earth and you?*

(1) How many calories are included in the typical Ornish day?

(2) Is your being a vegetarian good for the earth?

(3) Is your being a vegetarian good for you?

(4) What is the ratio of omega 6 and omega 3 oils in the Ornish diet?

(5) Is the Ornish program still effective if you do not do the meditation?

(c) ***The Protein Power Diet (The diet by Drs. Eades)***

(1) How many calories in the typical Protein Power day?

(2) What is the percentage of calories from protein?

(3) Are there patients who should avoid excess protein?

(4) How many digestible carbohydrates are allowed?

(5) Is this a ketogenic diet?

(6) How much fat and oils do they allow?

2 Comparing Steele, Ornish, Atkins and Protein Power: The Tables

Table 9-1

Calories/Fat /Protein/ Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

	Steele Diet for Women (Men may eat 50% more)	**Ornish Diet**	**Atkins Induction Diet**
Breakfast	Smoked wild salmon (2 oz.) (130/9/11/0/1-5/30) Eaten with a fork 1 Tbs. Cod liver oil (130/14/0/0/2-8/0) Green tea	Oatmeal ½ cup and 1 Tbs. raisins (181/3/5/27-4-23/0/0) Nonfat yogurt 8 oz (127/0/13/8-0-8/0-0/4) Whole wheat toast 1 slice 60/0/4/10-1-9/0-0/0) 1 Tsp. preserves (18/0/0/4-0-4/0/0) Orange juice 8 oz (112/1/2/26-2-24/0/0)	2 Eggs (140/9/12/2-0-2/3-0/426) 3 Canadian bacon (70/3/11/0/0-0/30) Decaf coffee Atkins' supplements
Lunch	Salmon salad (½ cup) (288/21/21/3-2-1/4-3/62)	Whole wheat burrito with red beans and "dirty rice" (308/3/15/52-13-39/0-0/0) Chutney (27/0/1/8-2-6/0-0/0) Tossed green salad w/ Chopped fresh cilantro (65/0/4/14-4-10/0-0/0)	Cheeseburger 4 oz (378/27/32/0/0-0/91) with 2 strips Bacon (60/5/4/0/0-0/10) No bun Salad w/ dressing (140/7/5/5-2-3/0-0/0) Seltzer
Snack	30 almonds (1 oz) (180/16/7/7-4-3/4-0/0) Green tea	Optional hot beverage	None

	Steele Diet for Women (Men may eat 50% more)	**Ornish Diet**	**Atkins Induction Diet**
Dinner	Filet mignon 6 oz (or other lean steak) with sautéed onion (338/27/48/6-2-4/3-0/130) Greens with garlic and olive oil or other fat (140/7/5/5-5-1/0-0/0)	Spinach ravioli (107/1/16/12-2-10/0/3)) Creamed lentil soup with celery (115/1/7/23-6-17/0/0) Garlic croutons (20/0/1/4-0-4/0-0/0) Herb salad (39/0/3/4-2-2/0-0/0)	Shrimp cocktail 4 oz 130/2/23/3-0-3/0-1/173) Clear consommé (20/2/0/0/0-0/0) Rib steak 6 oz (278/20/48/0/0-0/130) Salad w/ dressing 1 Tbs. (140/7/5/5-2-3/0-0/0)
Dessert	Strawberry smoothie (140/9/6/13-7-6/2-3/0)	Vanilla poached fruits (127/0/5/24-4-20/0/0)	Diet Jell-O w/ whipped heavy cream (53/6/0/0/0-0/21)
Calories Fat Protein CHO Fiber Net carbs O-6/O-3 Cholest.	1285 calories 98 gm (882 calories- 68%) 88 gm (352 calories- 28%) 32 gm 20 gm 12 gm (48 calories- 4%) 14 gm/16 gm (1:1) 222 mg	1306 calories 8 gm (72 calories- 6%) 64 gm (256 calories- 20%) 216 gm 40 gm (160 calories- 12%) 176 gm (704 calories- 54%) 0 gm/0 gm 7 mg cholesterol	1409 calories 88 gm (954 calories-57%) 140 gm (648 calories- 39%) 15 gm 4 gm 11 gm (40 calories- 2%) 3 gm/1 gm 881 mg cholesterol

Calories/Fat /Protein/ Total Carbs-Fiber-Net Carbs / Omega 6-Omega 3 / Cholesterol

	Atkins Ongoing Wt Loss	**Atkins Maintenance**	**Protein Power**
Breakfast	Western omelet w/ 2 eggs (262/21/14/4-1-3/2-1/556) 3 oz V-8 juice (20/0/0/3-1-2/0-0/0) 2 bran crispbread (24/0/2/8-4-4/0-0/0) Decaf coffee Atkins' supplements	Spinach and cheese omelet (375/30/21/4-1-3/0-0/586) ½ cantaloupe (48/0/1/12-0-12/0-0/0) 4 bran crispbread (48/0/4/16-8-8/0-0/0) Decaf coffee Atkins' supplements	2 Poached eggs on (140/9/12/1-0-1/2-1/426) 1 slice light bread toast w/ 1 Tsp. butter (74/5/2/9-2-7/0-0/10) ½ cup fresh or frozen berries (40/0/1/10-3-7/0-0/0) Coffee, tea or mineral water
Lunch	Chef's salad w/ ham, cheese, chicken and egg (338/19/20/6-4-2/2-1/75) w / oil and vinegar 1 Tbs. (140/14/0/2-0-2/2-0/0) Iced herbal tea	Roast chicken (1 breast) (293/14/38/0-0-0/0-0/111) 8 asparagus stalks w/ lemon (60/0/6/12-4-8/0-0/0) Salad with 2 Tbs. olive oil & vinegar dressing (170/14/2/6-2-4/2-0/0) Club soda	Grilled Chicken Sandwich w/ both buns removed (293/14/38/0-0-0/0-0/111) 1-2 cups of mixed greens, tomato wedges and olives olive oil dressing (170/14/2/6-2-4/2-0/0) ½ cup fresh or frozen berries (40/0/1/10-3-7/0-0/0)
Snack	None	None	1 oz hard cheese 1 peach or ½ Valencia orange (149/8/9/14-3-10/0-0/25)

	Atkins Ongoing Wt Loss	**Atkins Maintenance**	**Protein Power**
Dinner	Seafood salad (288/21/21/3-2-1/4-3/30) Poached salmon 312/19/36/2-0-2/3-9/93) Sautéed zucchini with garlic (83/7/2/4-2-2/1-0/0)	French onion soup (210/16/2/15-4-11/0-0/17) Salad w/ dressing (170/14/2/6-2-4/2-0/0) Steamed squash 1 cup (18/0/2/4-2-2/0-0/0) ½ baked potato (72/0/2/17-1-16/0-0/0) w/ 2 Tbs. sour cream (60/5/1/1-0-1/0-0/25) Breaded veal chops 6 oz (360/12/46/10-1-9/0-0/196) 5 oz of dry wine (85/0/0/3-0-3/0-0/0/0)	Grilled or boiled fish (salmon, swordfish, tuna) w/ lemon butter (270/17/27/0/3-9/93) 1 small zucchini, sautéed (83/7/2/4-2-2/1-0/0) 1-2 cups of mixed greens, tomato wedges, carrot curls, radishes and olives w/ olive oil dressing (170/14/2/6-2-4/2-0/0) 4 oz dry white wine
Dessert	½ cup strawberries 25/0/1/6-2-4/0-0/0) in 1 Tbs. heavy cream (53/6/0/0/0-0/21)	Generous cup of fresh fruit (127/0/5/24-4-20/0/0)	Strawberry sorbet (4 frozen strawberries w/ 2 Tbs. heavy cream, pureed until smooth (131/12/1/6-2-4/0-0/42)
Calories Fat Protein CHO Fiber Net carbs O-6/O-3 Chol	1545 calories 100 gm (900 cal- 58%) 94 gm (376 cal- 24%) 38 gm 16 gm 22 gm (88cal- 6%) 20 gm/14 gm 775 mg	2069 calories 105 gm (945 cal- 46%) 132 gm (528 cal- 26%) 130 gm 29 gm 101 gm (404 cal-20%) 4 gm/0 gm 935 mg	1468 calories 100 gm (900 cal- 61%) 97 gm (388 cal- 26%) 66 gm 19 gm 47 gm (188 cal- 13%) 10 gm/10 gm 707 mg

So, looking at…

3. **The Complexity of the Diets**

(a) ***The Fish Oils: the balance of omega 6 and omega 3 oils***

(1) The over-consumption of omega 6 oils has been associated with increased numbers of cancers. It is important to try to balance the omega 6 and omega 3 oils in a ratio of close to 2:1.

(2) The Ornish program, being a very low fat diet, thereby avoids the omega 3 oils in fish. The studies out of Great Britain show a 50% reduction in sudden cardiac death in people consuming an average of 9 grams of omega 3 oils per day[50] (in their kippers, Portuguese sardines and wild North Sea salmon). It appears that the consumption of some of these oils is healthy.

(3) The Atkins Diet allows but does not encourage the inclusion of these foods. He suggests you take supplements to meet these requirements. In addition to the oils, fish contain many other healthful substances (magnesium, calcium and chromium, as well as many other micronutrients of which we are not even aware) that are also a factor in reducing cardiac death. Eat food rather than supplements.

(4) Protein Power includes the lemon-flavored Cod liver oil as well as the flax oil (although the flaxseed oil has been associated with possible increase in prostate cancer).

(b) ***Food Sensitivity****: the reduction of foods associated with asthma, allergies, inflammatory bowel disease and arthritis.*

(1) In many people, milk makes more mucus. And this includes yogurt and low-fat cheeses. It is the protein in milk that promotes the allergic response, not the fat or sugar. The sugar can cause it's own problems with digestion in people who have lactose intolerance.

(2) Yet Dr. Ornish includes these foods frequently because of the need for some healthy low fat animal protein to supplement the Ornish Diet.

[50] Albert CM; Campos H; Stampfer MJ; Ridker PM; Manson JE; Willett WC; Ma J Blood levels of long-chain n-3 fatty acids and the risk of sudden death. *N Engl J Med* 2002 Apr 11;346(15):1113-8.

(3) Dr. Atkins mentions the possibility of food intolerance but has cheese included in many of his suggestions to add fat without adding excess protein.

(4) Dr. Atkins reintroduces a high fiber wheat product in his OWL diet to increase fiber and reduce constipation. This is further increased in his maintenance diet. There is good evidence that many of us do not tolerate wheat and feel better when we avoid it entirely.

(5) There is some evidence (from studies in the 1960's) that the nightshade vegetables (tomatoes, eggplant, potatoes and peppers) may be associated with arthritis in some people.[51] I try to give people the option of trying to avoid these foods to see if there is any difference.

(c) ***The Ketogenic Diet: the maintenance of mild ketosis and the attendant antioxidant state.***

(1) Work done by Cahill and others suggests that the ketogenic diet reduces oxidative stress and aging.

(2) Many people eating a ketogenic diet consume fewer calories. It is well shown that calorie restriction increases longevity in all animals tested.

(3) A lower glycemic diet also reduces many of the promoters of aging, including insulin levels and the glycation of proteins (see chapter 2 and 3). There is no food lower in glycemic index than fat.

(4) All heart disease risk parameters improve in patients on the ketogenic diet.

(5) All parameters of diabetes control improve on the ketogenic diet.

(d) ***The Glycemic Index***

(1) Dr. Ornish writes about the glycemic index and the importance of avoiding simple sugars and starch in his book Eat More and Weigh Less, but the glycemic index of his diet is high. Sugar is sugar, be it from fruit or cane sugar or chutney or milk. The high starch content of his diet in the form of rice, beans, tortillas, and oatmeal will also raise blood sugar and insulin levels.

[51] Panush RS. Possible role of food sensitivity in arthritis. A*nn Allergy* 1988 Dec;61(6 Pt 2):31-5.

(2) The other three diets are very low glycemic, except when Dr. Atkins begins to add back potatoes and bread in his maintenance diet.

(e) ***The Cholesterol Content***

(1) The cholesterol content of the Ornish diet is extremely low, as is the fat content. But the evidence that cholesterol is bad for us is lacking except perhaps in patients with genetically high cholesterol levels (about 5% of us) or those with poorly controlled diabetes. Those patients should avoid shrimp, lobster, and egg yolks as well as excess butter and cream.

(2) All of the other diets have similar cholesterol contents (all less than 1 gram per day). One gram is 1/30 of one ounce and has the total caloric content of nine calories (less than 1/2 of 1 percent of the total calories of any of the weight loss diets). Therefore, do not worry. But to be prudent, have your health care practitioner check your cholesterol, LDL, HDL and Triglyceride levels no matter which diet you choose.

4. **The Answers to the Quizzes**

(a) *Atkins' Diet Quiz*

When to snack? On what do you snack? How much can you have?

According to the Atkins program, you will not need to snack.

What do you want your ratio of omega 6 to omega 3 oils to be? What are the benefits of omega 3 oils? What are good sources of omega 3 oils?

Although Atkins suggested you eat fish, he never suggested how much fish to eat. But he did suggest you take his vitamin pack.

How many grams of fiber should you eat per day? Which supplements are helpful for constipation?

Dr. Atkins admitted his diet was low in fiber so he suggested patients with constipation take fiber supplements (many of my patients complain of too frequent bowel movements if any problem at all). The exception to this is older patients who do not consume adequate fluids due to urinary leakage or prostate problems.

What are possible reactions to dairy products? Which component of dairy promotes allergies? Are butter and heavy cream acceptable to those with allergies?

Dr. Atkins does suggest that people may have an adverse reaction to dairy, but he did little to address how to substitute for the cheese and other high-protein dairy in his diet plan.

What about wheat; could keeping the wheat and corn out of your diet be beneficial in the long run?

In his maintenance diet, Dr. Atkins adds back wheat fiber to add fiber to his diet, all the while admitting many people do not tolerate wheat well.

Is all of that cholesterol and saturated fat bad for you? How does Dr. Atkins suggest you check to see if you are having problems with the diet?

About 5% of the population (people with genetically high cholesterol) will have significant problems with the amount of saturated fat and cholesterol in the Atkins plan. In addition, people with diabetes will initially have elevations of their cholesterol levels on the high fat diet, which will return to normal as their diabetes goes away. Most physicians will treat these patients with cholesterol lowering drugs until the diabetes resolves.

What is metabolic resistance? Is it the same as insulin resistance? What is Syndrome X? How can you tell if you have metabolic resistance? How does that alter your diet?

Yes, they are the same. If your waist is over 35 inches, you probably have insulin resistance (metabolic resistance). Avoid simple carbohydrates (sugar, starches and sweet fruits) and greatly increase your intake of healthy fats.

What is a typical serving size of meat? 4 oz, 6 oz or 8 oz?

Dr. Atkins never made this clear, which is part of the reason that many women never lost weight on the Atkins' Diet. The size of your palm is 4 oz. This is the typical serving for women for lunch. Six ounces is a good amount for dinner. Men can eat 50% more for each meal (i.e. 6 oz. for lunch and 9 oz. for dinner).

Are the calorie requirements of men and women the same? If not, how much more can a typical man eat and still lose weight?

Women need to consume about 1200 calories to lose weight, while men can eat 1800 calories per day (so who said life was fair?). So women need to eat less to succeed, while most men can eat more. If you exercise to excess, you can eat more (2-3 hours per day).

Do you really need to take all of those supplements that Dr. Atkins suggests? Which are the critical supplements; what is the absolute minimum required for success?

The most important supplements are discussed in Chapter 10 on supplements. If you follow those recommendations you will save a lot of money and still stay healthy.

What are Lipolysis testing strips? Is this a fancy term for the Ketostix you buy in the pharmacy?

Yes. I encourage you to check for ketosis, because if you fall out of ketosis you are cheating with too many carbs!

Is ketosis bad for you? We know the induction diet is ketogenic (induces a state of ketosis where you burn fat as fuel instead of carbohydrate). But Dr. Atkins tells you to only be on this diet for the first two weeks. Is the On-going Weight Loss diet also ketogenic?

Ketosis appears to reduce markers of aging and maintain health. I encourage my patients to maintain ketosis to reduce aging. Alternate day feeding of rats keeps them young (physically and sexually) so they survive twice as long and have twice as much fun!

Is ketosis a bad thing? How many grams of Net Carbs are you allowed? Is it 20, 40, or 60 grams and how do you determine this?

The Ketostix are key to determining how many carbs you may consume. If you fall out of ketosis, fall back and reduce your carbs.

(b) ***The Ornish Diet*****:** *Is your being a vegetarian the best option for the Earth and you?*

How many calories are included in the typical Ornish day?

This varies between 900 and 1200 calories per day for men and women.

Is your being a vegetarian good for the earth?

If you believe that killing animals for humans to survive is wrong, then being a vegetarian is good. But much of the animal kingdom has no qualms to feeding their offspring meat. We are probably meant to be omnivores, consuming all foods present in the wild state of nature (not what you might find at your local fast food restaurant).

Is your being a vegetarian good for you?

The simple answer is no. We need vitamin B-12 (only present in the flesh of animals). We need omega-3 oils in fish for our brains and heart (albeit also present in flaxseed). We need healthy protein without the high levels of simple starches in beans, rice and whole grains.

What is the ratio of omega 6 and omega 3 oils in the Ornish diet?

Since fish is eliminated from the diet, there is very little omega 3 oils in this diet.

Is the Ornish program still effective if you do not do the meditation?

The unpublished data suggests that people who do not do the meditation component of the program do not benefit from reduced cardiovascular risks.

(c) *The Protein Power Diet*

How many calories in the typical Protein Power day?

Around 1500 calories per day (although again a difference is not made between the sexes). Men require about 50% more calories than women do, while women require fewer calories than men to have the same weight loss and health outcomes.

What is the percentage of calories from protein?

Despite the title of their book, this is not a high-protein diet but a high fat diet. But this is actually healthy as has been discussed above.

Are there patients who should avoid excess protein?

All patients with significant kidney or liver disease are recommended to avoid excess protein. But excess fat appears to be safe as long as your cholesterol is monitored and you do not cheat with sugar.

How many digestible carbohydrates are allowed?

The Protein Power diet allows well over 40-50 grams of digestible carbohydrates per day.

Is this a ketogenic diet?

No. If we consume more than 30-40 grams of carbohydrates per day, most of us will not be in ketosis. And since there is good evidence that ketosis may reduce oxidative stress and aging, it may be reasonable to reduce this amount down to 20-30 grams per day.

How much fat and oils do they allow?

Their sample day includes 61% of their calories from fat. This diet will curb your appetite and lower your insulin resistance as has been seen in many patients. My suggestion is still to consider the Mediterranean Hunter-Gatherer diet to see if you can claim even greater health.

A Balanced Diet is the Foundation of Health

Get Most of Your Nutrients from Good Food

10

NUTRITIONAL SUPPLEMENTS

First and foremost, nutritional supplements will not necessarily prevent a disease from developing in a specific patient. You can take Vitamin E, selenium and eat more broccoli than is humanly possible and still develop prostate cancer (I have seen it happen). But overall the taking of certain supplements is associated with a lower risk of certain diseases (see references in sections below):

- Chromium (inadequate in our soil and food): appears to reduce heart disease, diabetes and depression.
- Selenium: adequate intake is associated with much less prostate, colorectal and lung cancer (Brazil nuts are an excellent source).

1 Why Take Supplements?

Much of our food is grown in depleted soil with the help of nitrogen fertilizers- more bushels per acre but nothing in it- at least not much of the micronutrients we need. Eating organic is important for our bodies as well as the environment. This is why it is important to grow as much of your own food as possible and eat it fresh and raw. The following supplements can hedge your bets and ensure some semblance of complete nutrition although if you could grow all of your food (in the South of France) you would probably not need to take supplements.

2 The Top Three Supplements

There are three supplements, however, that actually make people feel (and look) better. I never miss taking these three. If I am out of town and my cod liver oil is in the refrigerator at home, I will make sure to eat salmon or sardines every day. See the following pages for doses and further information.

(a) *Chromium (reduces insulin resistance)*

Chromium is helpful in diabetes, depression, and to maintain lean body mass. I have found it very effective for improving mood although some patients have found it may give them too much energy. When older rodents are given chromium they behave like younger rodents.[52] Oh, to be a younger rodent…. The daily dose of chromium polynicotinate is 200 mcg each morning. Recent studies suggest possible harm from the picolinate form of the supplement. No suggestion of harm has been seen from the polynicotinate form, which is what is now recommended.

(b) *Omega-3 oils in cod liver oil (stabilizes electrical membranes)*

The consumption of omega-3 oils is associated with a 50% reduction in sudden cardiac death[53] as well as improvement of depression, ADD, schizophrenia and bipolar disorder.[54] It allows me to be nice to my wife. Try it, husbands (and wives?). If you won't eat the salmon or sardines, try the cod liver oil. The amount is 2-3 ounces of fatty fish or 1 Tbs. of cod liver oil (unfortunately this is 6-9 capsules of the fish oil).

(c) *MSM (methylsulfonylmethane- an important sulfur source for healthy connective tissues)*

MSM is present in rainwater and all living things (but not in dead things like most of our food). MSM has been shown effective in knee arthritis and allergic rhinitis. Patent applications suggest it is helpful for tendonitis, asthma, acne, snoring and wrinkles. This supplement makes your knees feel normal and the rest of you feel like you are16 years old (which occasionally gets me in trouble with my wife- that's why I take the Omega-3 oils). The dose is 3-4,000 mg in the morning (or 1 Tsp. of the MSM powder mixed in water).

3 Safety and Efficacy of the Three Key Nutritional Supplements

(a) *Chromium polynicotinate* (200-400mcg daily; twice daily in diabetes)

In the belief that an elevated insulin level promotes aging and disease, chromium is the supplement for you. Chromium is not in our food in adequate amounts so deficiency is common, particularly in patients with diabetes or pre-diabetes.

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[52] McCarty MF. Longevity effect of chromium pioclinate-'rejuvenation' of hypothalamic function? *Med Hypotheses* 1994 Oct;43(4):253-65.

[53] Albert CM; Campos H; Stampfer MJ; Ridker PM; Manson JE; Willett WC; Ma J Blood levels of long-chain n-3 fatty acids and the risk of sudden death. *N Engl J Med* 2002 Apr 11;346(15):1113-8.

[54] Nemets B; Stahl Z; Belmaker RH Addition of omega-3 fatty acid to maintenance medication treatment for recurrent unipolar depressive disorder. *Am J Psychiatry* 2002 Mar;159(3):477-9.

(1) Improves Diabetes and Insulin Resistance

Greatly improves blood sugars in patients with Type 2 diabetes. Supplemental Chromium improved the blood glucose, insulin, cholesterol, and hemoglobin A1C in people with Type 2 diabetes in a dose dependent manner. (Dose was 500 mcg twice daily) Follow-up studies have confirmed these studies.[55]

Patients with diabetes require more chromium. Urine losses of chromium over many years may exacerbate an already compromised chromium status in patients with type 2 diabetes and might contribute to the developing insulin resistance seen in patients with type 2 diabetes. Patients with type 2 diabetes had mean levels of plasma chromium around 33% lower and urine values almost 100% higher than those found in healthy people.[56]

Improves Gestational Diabetes: Daily intake of 8 mcg/kg body weight was more effective than 4 mcg/kg in women with gestational diabetes. The mechanism of action of chromium involves increased insulin binding, increased insulin receptor number, and increased insulin receptor activity.[57]

Markedly reduces steroid-induced diabetes: diabetes medications were reduced by 50% in patients on steroids treated with chromium 600 mcg per day.[58]

Chromium effective in Type 1 diabetes: 28-year-old woman with an 18-year history of type 1 diabetes mellitus whose Hgb A1c (the test for diabetes control: normal is up to 6.1%) declined from 11.3% to 7.9% 3 months after initiation of chromium, 200 micrograms 3 times daily.[59]

(2) Improves Chronic Depression

In patients with symptoms of chronic depression, chromium supplementation led to remission of dysthymic symptoms.[60]

(3) Improves Heart Disease

Reduces cardiac disease in a population genetically predisposed to insulin resistance.[61]

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[55] Anderson RA, J Am Coll Nutr 1998 Dec;17(6):548-55 Chromimum, glucose intolerance and diabetes.

[56] Morris BN et al, J Trace Elem Med Biol 1999 Jul;13(1-2):57-61. Chromium homeostasis in patients with type II (NIDDM) diabetes.

[57] Anderson RA, J Am Coll Nutr 1998 Dec;17(6):548-55 Chromimum, glucose intolerance and diabetes.

[58] Ravina A et al. Diabet Med 1999 Feb:16(2):164-7 Reversal of corticosteroid-induced diabetes mellitus with supplemental chromium.

[59]Fox GN, Sabovic C, J Fam Pract 1998 Jan;46(1):83-6 Chromium picolinate supplementation for diabetes mellitus.

[66] McLeod MN, Gaynes BN, Golden RN. Chromium potentiation of antidepressant pharmacotherapy for dysthymic disorder in 5 patients. *Clin Psychiatry* 1999 Apr;60(4):237-40.

(4) No evidence of toxicity in doses of 500 mcg twice daily

No evidence of toxicity in rats at 100mg/kg for six months: Rodents feed chromium picolinate 100 mg/kg for six months (several thousand times the upper limit of the estimated safe dose) showed no toxic effects of chromium on liver or kidney. This was documented by histologic examination (the equivalent of an autopsy with microscopic evaluation of organs).[62]

Toxicity has not been reported in clinical studies. A study showing DNA breaks with picolinate has been severely criticized (similar to pouring LSD on cell cultures and seeing DNA breaks).[63]

One case of renal insufficiency has been reported with chromium picolinate overdose: A case of kidney failure thought to be possibly secondary to chromium picolinate (2500 mcg per day for 3 months). One year later, all laboratory values were within normal limits. [64]

(5) Does chromium make you think and feel younger?

Supplementation of chromium in rodents appears to fool the hypothalamus (the part of the brain that controls sexual hormone production and release) into behaving younger; the hormones and behavior of the chromium-supplemented rodents were similar to much younger rodents.[65]

(b) *Omega-3 oils in fatty fish and cod liver oil* (1 Tbs. of cod liver oil daily)

(1) How to get the Omega-3 oils into your diet

One Tablespoon of cod liver oil provides the 9 grams of Omega-3 oils, which is equivalent to the dosage used in most studies. Be sure to keep these oils in the refrigerator or they will turn rancid (and smell fishy- and oxidized oils are harmful). I previously recommended Flax oil and Flaxseed but these have recently been suspected of possibly increasing prostate cancer. The cod liver oil provides the same omega-3 oils and has not been associated with problems. The cod liver oil does have a lot of vitamin D, so I would avoid extra vitamin D in the calcium supplement and multivitamin.

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[61] Mahdi GS. *Lancet* 1995 Apr;345:982-2. Coronary risk factors in people from the Indian subcontinent.
[62] Anderson RA, Bryden NA, Polansky MM. Lack of toxicity of chromium picolinate in rats. *J Am Coll Nutr* 1997 Jun;16(3):273-9.
[63] Speetiens JK et al. The nutritional supplement chromium picolinate cleaves DNA. *Chem Res Toxicol* 1999 Jun;12(6):483-7.
[64] Cerulli J et al. Chromium picolinate toxicity. Ann Pharmacother 1998 Apr;32(4):428-31 .
[65] McCarty MF. Longevity effect of chromium picolinate-'rejuvenation' of hypothalamic function? Med Hypothese 1994 Oct;43(4):253-65.

Eating a total of 12 ounces per week of salmon, kipper herring or sardines will also provide an average of 9 grams per day. I try to eat sardines for lunch several days per week. I particularly like the Bristling Sardines in 2 layers packed in olive oil by Crown Prince. Avoid the farm-raised salmon because they have much less of the Omega-3 oils (because they are fed "dog food" and often given antibiotics to prevent disease). Even the organic food stores carry farm-raised salmon so try to find either the wild Alaskan salmon or wild North Sea or Norwegian salmon.

If you do not want to take a tablespoon of the oil, the oil may be used in an oil and rice vinegar dressing (make fresh or keep refrigerated as cod liver oil will go rancid if heated or left at room temperature). Try to avoid the capsules of flax oil or fish oils. First, the dose is 9 capsules per day (too much and too expensive). In addition, these capsules frequently contain rancid oils, so I would try to stick with the fresh bottles of oils or the actual fish themselves- sardines are the perfect food).

(2) Reduces extra beats or skipped beats of the heart

Consuming an average of 9 grams per day has been associated with a 50% reduction of sudden cardiac death in 2 British trials (this was shown using the fatty fish listed above, which also contain magnesium which can itself reduce cardiac arrhythmias). For this reason the omega-3 oils can be very helpful in people with extra beats or skipped beats of the heart, particularly if taken in conjunction with magnesium.

(3) Improves mood disorders and thought disorders

The psychiatrists are very excited about the improvements they are seeing in patients with depression, schizophrenia, bipolar disorder and attention deficit disorder using the capsules of fish oils. Again, I would try to eat fish or use the fresh oils and avoid the capsules.

(4) Can act as an anticoagulant

The supplementation of omega-3 oils should be stopped about a week before any major surgery. The same goes for Vitamin E, aspirin, as well as gingko, garlic, ginger or ginseng (the four G's).

(5) What is the ideal balance of Omega-3 and Omega –6 oils?

From my reading the ratio of omega-3 to omega-6 should be from one to two up to one to four. The present average in this country is between one to ten up to one to fifty if you only consume processed foods. The Mediterranean Hunter-Gatherer diet has a ratio between one to two up to one to four depending on how much fatty fish you eat.

(6) Should we supplement with gamma linoleic acid (GLA) as well**?**

Most of us can convert linoleic acid omega-6 oil in our bodies and our diets) to GLA. With illness and aging some of this ability is lost. GLA has been shown to improve eczema, neurologic complications of diabetes, breast pain and premenstrual syndrome. The dose of Evening Primrose oil from the studies is 3-6 grams per day.

The problem I see is that most of us already consume too many omega-6 oils in our diets. Some animal data suggests that omega-6 oils promote the growth of cancer cells. There is 7 times the amount of LA as GLA in Evening Primrose oil. It probably makes sense for most of us to allow our bodies to produce our own GLA (we naturally produce 100 to 1000mg per day by some estimates).

(c) *MSM (methylsulfonylmethane) (*3,000-4,000 mg in the morning)

When our ancestor Eve was in equatorial Africa and she became hungry, she wouldn't run to the Acme Grocery Store or the Seven Eleven for something to eat. She would go out into her yard (she had a really big yard) and find something to eat, still living, either on a bush or tree or perhaps running along. And she would eat it raw. What is interesting about this is that there are nutrients that are in fresh foods (still on the plant) but not in the best organic foods at the organic food stores. An example of these nutrients is methylsulfonylmethane or MSM.

(1) The Importance of Sulfur in Metabolism

MSM is present in fresh fruits and vegetables (still on the plant or just picked minutes ago), but degrades rapidly during storage or with heating or processing. Also present in raw fish and meat (and rare beef and other meat) and in rainwater. It appears to be an important intermediary in the natural global sulfur cycle.[66] It is the non-toxic, non-odor producing metabolite of DMSO (dimethylsulfoxide, the breakdown product of rotting trees that is part of the Earth's sulfur cycle; DMSO acts as an excellent natural source of sulfur for plants and animals). MSM has been shown to be present in the milk and urine of humans and other animals.

The amount of MSM ingested is one of the rate-limiting steps for methionine synthesis, an important sulfur containing amino acid in the creation of healthy connective tissue and the control of inflammation. This nutrient is important in creating healthy connective tissue (contributes to the body's production of chondroitin sulfate that forms the cartilage in our joints) and controlling inflammation of allergies, arthritis, and tendonitis.

[66] Richmond VL. Incorporation of methylsulfonylmethane sulfur into guinea pig serum proteins. *Life Sciences* 1989 Jul; 39(3):263-8.

Methionine deficiency (from the lack of good sulfur sources in our diets such as raw egg yolk) can lead to degenerative diseases. These diseases include arthritis, allergies and asthma, cancer, insomnia, muscle cramps, tendonitis, and depressed mood. It is estimated that 40% of the elderly have severe sulfur deficiency, which leads to many of their problems in aging.

MSM is a precursor for S-adenosyl-L-methionene (SAMe), which has been shown to be effective for arthritis and depression (but SAMe is much more expensive). MSM has been shown to be helpful in patients with interstitial cystitis and the urethral syndrome.[67] It also reportedly reduces wrinkles and promotes healthy nails and hair**.** Acne and constipation are also improved, although some patients report loose stool at times with the use of MSM.

(2) What is the correct dose of MSM?

The duration of action of MSM (the half-life in the blood) has been calculated to be 38 hours in the Rhesus monkey.[68] It appears the intestinal bacteria may be responsible for some of the incorporation of MSM into essential sulfur amino acids such as methionine.

Methylsulfonylmethane (MSM) 3000mg once in the morning is the dose used in the knee arthritis study and the allergic rhinitis study. (Buy the 1000mg tablets or capsules, or I buy the powder and take 1 Tsp. each morning, which equals 4 grams of MSM. The powder is, however, a little bitter). The major side effect of therapy in these studies was loose stool.

4 Mineral Supplements

(a) *Magnesium* (250mg once or twice daily)

Maintains the health of bone by facilitating the absorption and metabolism of calcium. In fact, if you take calcium without magnesium you can develop a relative magnesium deficiency and worsening osteoporosis.

Prevents constipation by maintaining adequate magnesium levels. Helps lower blood pressure in patients with hypertension. Reduces cardiac arrhythmias (extra beats of the heart) in patients with palpitations or heart disease. Helps reduce sudden death in patients with dilated hearts and congestive heart failure.

[67] Layman DL, Jacob SW. The absorption, metabolism and excretion of dimethyl sulfoxide by rhesus monkeys. *Life Sci* 1985 Dec;37(25):2431-7.

(b) *Calcium* (250-500mg once or twice daily)

Calcium is required for bone health and the prevention osteoporosis. The correct ratio of calcium to magnesium is between 2:1 and 1:1. This means if you are taking 1,000mg of calcium, you need to take at least 500mg of magnesium. It makes sense to take calcium with added Vitamin D (total of 800 units per day) because most of us do not get adequate sun exposure for adequate Vitamin D conversion.

5 Possibly Useful Supplements: The Antioxidants

Antioxidants protect our mitochondria (the part of the cell that produces energy to run and repair our cells) and help keep the mitochondria producing enough energy so the cell can continue to repair itself and thereby remain healthy. Antioxidants also help reduce the super-oxide radicals that produce cell damage, aging and cancer.

Most of the studies showing an association of antioxidants with improved health outcomes have been looking at foods rich in the vitamin E (mostly nuts and oils) and vitamin K (green leafy vegetables). Eating good food also helps our bodies produce alpha lipoic acid and coenzyme Q-10 (the ketogenic diet has been associated with improved oxidative state, less oxidative stress and improved coenzyme Q-10 function. It therefore may not be essential that we supplement with these.

The one supplement from this group that is important to all of us is selenium. Most of us do not get adequate selenium from our diets because the best sources of selenium are Brazil nuts and other foods grown in selenium rich soil (Brazil and North Dakota).

(a) *Selenium* (200mcg once daily)

If you live in North Dakota or Brazil you get sufficient selenium in your diet and water to promote good health. The rest of us are probably not getting enough. Taking a supplement of 200 mcg was associated with 63% fewer prostate cancers, 56% fewer colorectal cancers, and 47% fewer lung cancer in average follow-up of 4 ½ years in a recent study. The British Medical Journal suggested that taking selenium was more effective than stopping smoking in reducing lung cancer. Ex-smokers have ongoing inflammation due to the tars and other irritants already present. The antioxidant effect of selenium (and vitamin E?) appears to protect the lung from these tars.

Selenium supplementation has been shown safe in doses of 100-200 mcg per day (3 Brazil nuts). Selenium can be toxic over 800 mcg per day (nausea and stomach distress). People who eat a significant amount of fish may only need this supplements 2-3 times per week (the ocean still has adequate selenium; just do not eat the farm-raised fish). I eat 3-6 Brazil nuts per day and lots of fish.

(b) *Alpha Lipoic Acid* (300mg once daily; twice daily if neurologic disorders)

Alpha Lipoic Acid is an antioxidant that prevents or improves nerve damage caused by diabetes. The dose from the studies for diabetes is 300 mg twice daily.[69] Supplementation with alpha-lipoic acid can improve insulin sensitivity in patients with type-2 diabetes.[70] It also decreases oxidative stress even in diabetic patients with poor sugar control and kidneys that are already leaking protein.[71] Patients with diabetes, nerve damage or dementia may want to try the 250-300mg twice daily for 6-8 weeks to see if there is improvement in their condition.

(c) *CoEnzyme Q-10* (100mg daily; three times daily if neurologic disorders)

Reduces mitochondrial gene deletion, which is associated with heart failure, memory loss, and diabetes. There have been a few studies suggestive that supplementing with coenzyme Q-10 may reduce heart failure and the recurrence of breast cancer. It also appears to be very effective for neurodegenerative diseases such as Parkinson's disease, Huntington's Chorea and Alzheimer's disease. The dose for treatment is 100mg three times daily, although doses up to 600mg twice daily has been used in Parkinson's with excellent results. It has also been shown to reduce periodontal disease (the major cause of the loss of teeth).

(d) *Vitamin K*

(1) Osteoporosis, Atherosclerosis, and Alzheimer's

Vitamin K is critical not only in blood clotting, but now it is recognized as a critical component in maintaining the health of our bones, blood vessels and brain. Most people are not eating the necessary amount of vitamin K. The best sources of vitamin K are the dark green leafy vegetables (broccoli, spinach, kale, red leaf lettuce, etc), but these require the conversion of vitamin K-1 to K-2 by the bacteria in our intestine.

(2) Vitamin K Content in Foods

The highest concentrations (3000-6000 micrograms/kg) are found in dark-green leafy vegetables and herbs, such as kale, parsley, collard greens, mustard greens, turnip greens, spinach and green cabbage. Intermediate concentrations (1000-2000 micrograms/kg) are found in plants with paler leaves such as white cabbage and lettuce or in green, non-leafy vegetables such as broccoli and Brussel sprouts.

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[69] Ruhnau KJ et al. Effects of 3-week oral treatment with the antioxidant thioctic acid (alpha-lipoic acid) in symptomatic diabetic polyneuropathy. *Diabet Med* 1999 Dec;16(12):1040-3.
[70] Jacob S et al. Oral administration of RAC-alpha-lipoic acid modulates insulin sensitivity in patients with type-2 diabetes mellitus: a placebo-controlled pilot trial. *Free Radic Biol Med* 1999 Aug;27(3-4):309-14.
[71] Borcea V et al. *Free Radic Biol Med* 1999 Jun;26(11-12):1495-500.

Other foods such as dairy products, meat dishes and cereal-based foods (bread, biscuits, cakes, desserts etc.), although not in themselves particularly rich in vitamin K1 (< 200 micrograms/kg), may contribute significantly to intakes when consumption of green vegetables is poor.

Fats and oils contain variable amounts of vitamin K1 with the highest concentrations (300-1300 micrograms/kg) in canola and olive oils. Vitamin K requires oil to be absorbed (fat-soluble). Hence the need for oil on your salad and vegetables. Low fat diets, Olestra, bile acid binders, and mineral oil laxatives reduce absorption of vitamin K (and other fat-soluble nutrients).

(3) Other Interesting Effects of Vitamin K

Vitamin K also has been shown to inhibit IL-6 (Interleukin-6, a mediator of inflammation (Ferrucci L) (Weber P)). Patients with apolipoprotein E-4 (inherited abnormality that is associated with Alzheimer's) clear Vitamin K more rapidly and also have osteoporosis. It is postulated the abnormal calcium metabolism may also be damaging the brain (Kohlmeier M).

Vitamin K prevented atherosclerosis in rabbits bred to have high cholesterol levels (Kawashima H). Some improvement seen in animals with diabetes with vitamin K supplementation. Vitamin K does not cause increased blood clotting, even at doses of 250mg/kg in laboratory animals (Ronden J). Warfarin has been shown in one large study to be associated with increased fracture rate in older women (another showed no effect) (Booth S). There is a blood test available for undercarboxylated osteocalcin, which predicts risk of fracture in institutionalized women (aged 70-97 years), odds ratio of 3.1 for an elevated level at baseline and followed for 3 years (Szulc P).

(4) Our intake of Vitamin K is too low

Undercarboxylation (lack of vitamin K effect) of the matrix GLA proteins (MGP) in your blood vessel walls is a risk factor for vascular calcification and that the present RDA values are too low to ensure full carboxylation of MGP.[72] A substantial part of the population is mildly deficient in vitamin K, and at later ages this deficiency may contribute to increased bone fracture risk, arterial calcification, and cardiovascular disease.[73] Strenuous exercise may result in hypoestrogenism and amenorrhoea. As a consequence a low peak bone mass and rapid bone loss are often seen in relatively young athletes. All participants received vitamin K supplementation (10 mg/day). In the low-estrogen group vitamin K supplementation induced a

[72] Schurgers LJ, Dissel PE, Spronk HM, Soute BA, Dhore CR, Cleutjens JP, Vermeer C. Role of vitamin K and vitamin K-dependent proteins in vascular calcification. *Kardiol* 2001;90Phytonadione:57-63.

[73] Vermeer C, Schurgers LJ. A comprehensive review of vitamin K and vitamin K antagonists. *Hematol Oncol Clin North Am* 2000 Apr;14(2):339-353.

15-20% increase of bone formation markers and a parallel 20-25% decrease of bone resorption markers. This shift is suggestive for an improved balance between bone formation and resorption.[74]

(5) Recommended doses of Vitamin K

Five to six servings of serious green leafy vegetables per day (Kale, Swiss chard, collards, spinach, dandelion greens, green and red cabbage, broccoli, red and green leaf lettuce, romaine lettuce, endive, Chinese cabbage, bok choy, fennel, celery, cucumbers, cauliflower, zucchini, Brussel sprouts).

The recommended dose is 10mg per day of Vitamin K-1 for people at risk for Vitamin K deficiency, atherosclerosis, osteoporosis, and Alzheimer's disease (not the 100mcg dose).

(e) ***Vitamin E*** (Eat almonds; avoid supplements unless for macular degeneration)

Again, most of the data for the benefits of vitamin E come from nutritional studies linking a diet rich in vitamin E (from oils and nuts) to lower rates of disease, in particular lung and prostate cancer, heart disease and Alzheimer's disease. Many of the studies of vitamin E supplementation have been disappointing so my recommendation is to increase your intake of healthy oils (olive and nut oils) and nuts. Two recent studies suggested that supplemental vitamin E may actually increase heart disease.

The one area of research that may be promising is Alzheimer's disease. Large doses of vitamin E (2,000 IU per day) did show slight slowing of progression of memory loss in patients with Alzheimer's disease (but not enough to be clinically important). A study also showed a 40% reduction of prostate cancer in smoking Scandinavian men, but most of us do not smoke nor are we from Scandinavia.

If you would like to take a supplement, 200-400 IU is enough for most of us. The correct formulation is natural vitamin E (known as d-alpha tocopherol plus mixed tocopherols). May increase risk of bleeding if taken with aspirin. Stop one week prior to surgery. My suggestion is to eat nuts and healthy oils to get your vitamin E.

[74] Craciun AM, Wolf J, Knapen MH, Brouns F, Vermeer C. Improved bone metabolism in female elite athletes after vitamin K supplementation. *Int J Sports Med* 1998 Oct;19(7):479-484.

5 Another Fat Soluble Vitamin

(a) *Vitamin D*

If you live near the equator and spend an hour in the sun each day, you will have an adequate supply of vitamin D. Most of us don't. So take 800 units of vitamin D in the wintertime (either in your 1 tablespoon of cod liver oil, multivitamin or your calcium-vitamin D tablet). But in the summer, try to get some sun without burning please.

6 Effective Herbal Supplements

(a) *Milk Thistle (Silymarin)*

Shown some effectiveness in chronic hepatitis including that is caused by alcohol[75] and Hepatitis C infection.[76] Effective dose is 140 mg of silymarin (the standardized extract) three times daily. No harmful effects have been reported.

(b) *Saw palmetto and Stinging nettles*

Improvement in symptoms, urine flow volumes and residual urine volumes in patients with symptomatic enlargement of the prostate (BPH).[77] Effective dose of the 80-90% sterols extract (not just the dried berries) is 160mg twice daily. Do not continue taking the supplement if a positive effect is not seen within 3 months. May reduce PSA readings (the blood test for prostate cancer). Avoid taking for several weeks prior to having the PSA test done. The taking of Proscar (a drug with effects similar to saw palmetto) decreased the new cases of prostate cancer but appeared to increase death through more aggressive tumors. Therefore it is prudent to avoid both Proscar and saw palmetto unless the symptoms are severe enough to warrant the risk.

(c) *Feverfew*

Reduces frequency of migraine headaches. Effective dose is 125 mg of the dried herb (2-3 leaves of fresh or dried leaves). This herb is easy to grow in a pot in the kitchen window or in the garden (it winters over).

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[75] Canini F et al. Use of silymarin in the treatment of alcoholic hepatic steatosis. *Clin Ter* 1985;17:417-21.
[76] Liu JP; Manheimer E; Tsutani K; Gluud C Medicinal herbs for hepatitis C virus infection. *Cochrane Database Syst Rev* 2001;(4):CD003183.
[77] Bracher F. [Phytotherapy of benign prostatic hyperplasia] *Urologe* 1997,Jan 36(1):10-17.

(d) ***Black Cohosh***

Appears to function as an estrogen substitute. Effective dose is 20mg extract (Remifemin) 2 tablets twice daily.[78] May cause stomach upset. Do not take for longer than 6 months because unopposed estrogen is associated with cancer of the breast and uterus.

(e) ***Ginkgo***

Improves cognitive function in patients with Alzheimer's disease. Reduces muscle cramps. Reduces ringing in the ears.

(f) ***Capsicum***

Effective for chronic pain when applied topically. Thought to reduce Substance P in tissues which promotes pain. Use only on intact skin. Avoid use on inflamed tissues or open wounds (will burn the tissues).

(g) ***Melatonin***

Effective for jet lag when taken at bedtime for several days during and after travel. May reduce cataracts. Do not take if you have seasonal affective disorder (SAD). Patients with this disorder already have elevated melatonin levels.

(h) ***Garlic***

Crushed garlic is rich in allicin. Allicin has significant inhibitory effect against viruses, fungi and parasites. Known as Russian penicillin during World War 2 because of its widespread use for wound infections. May lower cholesterol although studies have been conflicting. May stimulate the immune system; monitor use in patients with autoimmune disorders. Inhibits blood clotting and therefore may reduce heart disease and stroke but also can promote bleeding. Avoid for one week prior to surgery.

(i) ***Valerian root***

Mild anti-anxiety effect; can be used for insomnia. Long-term regular use not recommended as tolerance and subsequent sleeplessness and anxiety can develop.

[78] Liske, E. Six-month randomized controlled trial of Remifemin. *Journal of Women's Health & Gender Based Medicine,* 11:2, 2002.

7 Herbal Supplements Not Recommended

(a) *Echinacea*

Activates the immune system in an indiscriminate fashion. Although it may shorten the course of colds and flu, echinacea will exacerbate all autoimmune disorders including Multiple Sclerosis, Rheumatoid arthritis, pemphigus and others. Do not take for more than 8 weeks at a time for any reason.

(b) *Glucosamine*

Has been shown to slow loss of cartilage in knee arthritis and some patients experienced some rebuilding of cartilage; it also reduces pain in knee arthritis. The problem is it can elevate blood sugars in patients with diabetes and patients taking glucosamine are more likely to develop diabetes (unmasking insulin resistance). Effective dose is 750-1000 mg twice daily (but follow your blood sugars).

(c) *Kava-kava*

This is natural Xanax (which is the most habit-forming anti-anxiety drug) and has a significant withdrawal syndrome associated with excessive use. New Zealand has Kava clinics because of overuse of kava in the form of a concentrated tea.

8 Nutritional Supplements Considered Harmful and to be Avoided

(a) *Iron*

Do not take iron if you are a man or a post-menopausal woman. Excess iron promotes disease of the liver, heart and pancreas. Excess iron may promote infections. Donate blood at the Red Cross when you have an opportunity (we were meant to have intestinal parasites to remove excess iron from our systems). Have your ferritin (blood iron level) checked by your doctor. Do not drink red wine if your iron level is elevated. You may take iron if you are pregnant or a menstruating woman with a low blood count. Most of us get adequate iron from our diets.

(b) *Excessive doses of vitamin C*

Doses over 500 mg/day are associated with increased calcification of the blood vessels to the brain (which is associated with an increased risk of stroke). Vitamin C increases absorption of iron; do not take with a high iron meal (meat, fish or poultry).

(c) ***Excessive doses of Beta-carotene***

Doses over 20,000 units per day are associated with an increased risk of lung cancer.

(d) ***Excessive doses of zinc and copper***

Doses of more than 25 mg/day of zinc was associated with increased death in patients with AIDS (zinc deficiency is also associated with increased death). The recommended dose of zinc is 15mg per day, balanced by 2 mg of copper (the amount in most multivitamins). Excessive copper can also be harmful.

(e) ***Excessive doses of DHEA-S***

The use of DHEA-S is associated with increased road-rage, as might be expected by the testosterone effect. I suggest trying the chromium and weight bearing exercise to 'rejuvenate' your hypothalamus and sex hormones.

(f) ***Excessive doses of vitamin D***

Maximum recommended vitamin D is 800-1200 units/day although doses up to 2,000 units per day have not been found toxic. Most people unfortunately do not get adequate vitamin D from sun exposure. The cod liver oil has 800 units per tablespoon, which when added to our diet and lifestyle will ensure adequate vitamin D.

(g) ***Borage oil***

May contain carcinogens and liver toxins

(h) ***Ephedra***

Contains ephedrine, which is associated with cardiac deaths in patients using for weight loss.

(i) ***Poke root***

Very toxic; causes low blood pressure, slow pulse and respiratory depression

(j) ***Skullcap***

Can cause liver damage

9 One Daily without Iron

Choose a multi-vitamin that provides good levels of B vitamins without too much A or D. Most of the One Daily vitamins will have 400 units of vitamin D. Adequate vitamin D is important in the winter, as most of us do not have adequate sun exposure during the winter months.

Avoid iron-containing vitamins. Men and postmenopausal women do not need iron, and excess iron can be harmful.

The B vitamins lower homocysteine levels. Homocysteine damages blood vessels, oxidizes LDL cholesterol, and increases blood clotting which increases heart attacks and strokes. Lowering homocysteine levels reduces heart attacks, strokes, and blood clots. Most of us do not get adequate B vitamins, especially those over the age of 50 years old. Make sure your MVI has 25-50 mg of vitamin B-6, 25-50 mcg or more of vitamin B-12 and 400 mcg or more of folic acid (folate).

11

ULTIMATE SPORTS NUTRITION

(For the Ultimate Athlete hidden inside of you!)

1 The Cleaner and More Efficient Fuel

It is well known that trained athletes have a greater ability to burn fat,[79] which spares glycogen stores during endurance exercise. But is there a way to bypass training and get our bodies into great shape and endurance without spending all of that time exercising? Is there another way to get our bodies to burn fat as fuel from the get-go? Perhaps, so read on.

Using fat as fuel allows the heart muscle to be 25% more efficient while consuming 20% less oxygen. In fact, burning fat is like burning natural gas. The end products are carbon dioxide and water, which are easily excreted. Burning sugar requires more oxygen and produces more oxidative stress (read aging) as well as more toxic byproducts such as lactic acid, which leads to muscle fatigue and cellular stress (like using an unvented kerosene heater indoors?).

(a) *Most of Our Energy is Stored as Fat*

Most of our energy is stored in fat: our body's energy stores (the average 70-kilogram man)

• Fat 12 kg		110,000 calories
• Protein 6 kg		24,000 calories
• Carbohydrate in muscle	0.4 kg	1,600 calories
• Carbohydrate in liver	0.07 kg	270 calories

While running a marathon the average runner will consume 1,000 calories per hour. It will take most people 3-4 hours to finish. This means that much of the energy used in running the marathon must come from stored fat. Hence the sensation of hitting the wall partway

[79] Pendergast DR, Leddy JJ, Venkatraman JT. *J Am Coll Nutr* 2000 Jun;19(3):345-50.

through as the runner must convert from glucose (glycogen or carbohydrate) to fat for fuel. But what if our bodies were primed to use fat as fuel from the beginning?

Mamo Wolde, the runner who won the 1968 Olympic marathon, was a hunter from sub-Saharan Africa who consumed mostly fat and protein from the animals he caught and ate. When asked about hitting the wall, he did not understand because he had never experienced such a feeling. He was able to run without developing fatigue. And at 36 years old he is the oldest person to ever win the Olympic marathon. So how do the rest of us develop this ability?

(b) *You Need to Eat Fat to Burn Fat*

A high fat diet promotes increased fat utilization although it takes a period of adjustment for this to happen. Trained athletes have increased fat utilization during exercise even on a high carbohydrate diet (but I consider all of this training to be cheating- sort of). It appears to take more than one week on a high fat diet to change metabolism to increased fat metabolism during exercise. A positive effect is seen in athletes fed a high fat diet for 2-4 weeks (60-70% of calories from fat, 20-25% from protein, and the balance from carbohydrates). This must also be a very-low-carbohydrate diet.

Some studies (in mice, Greyhound dogs,[80] men and women[81]) have shown significant increases in speed and endurance. Many other studies have shown no difference. A few studies have shown a reduction in performance; most of these studies were of short duration (usually a week or less) which may reduce the body's ability to at least increase fat utilization during exercise. The general consensus is the high fat diet either improves or maintains aerobic capacity in cyclists, runners, Greyhound dogs, and mice.

No adverse affects on cardiovascular risk factors were seen in athletes on a high fat diet (70% of calories from fat). In fact, the good fats (HDL, LDL density and Apolipoprotein A) all went up, while the bad factors (LDL, triglycerides and Lipoprotein a) went down. All of this suggests an improvement of cardiovascular risk with the high fat diet.

2 Using Fat as Fuel Reduces Muscle Loss and Oxidative Stress

After an overnight fast much of our glycogen stores are depleted. The resting brain consumes 450-500 calories per day by itself. It normally uses glucose as the primary energy source. The glucose level in the blood is carefully maintained to support the brain. In early starvation, you deplete the glycogen stores in muscle and liver in order to maintain adequate blood glucose levels.

[80] Hill RC, Bloomberg MS et al. *Am J Vet Res* 2000 Dec:61(12):1566-73.
[81] Hoppeler H, Billeter R et al. *Int J Sports Med* 1999 Nov;20(8):522-6.

As fasting continues, your body begins to break down protein and fat to maintain the blood sugar. Initially you can lose up to one pound of muscle per day. But after a day or two, the ketoacids (the major one being beta-hydroxybutyrate) begin to accumulate from the breakdown of fat. Beta-hydroxybutyrate (one of the three ketoacids) inhibits the breakdown of muscle (blocks the proteases or enzymes that cause muscle breakdown).

(a) *You Gain Muscle While You Lose Only Fat*

The worst thing you can do to a fasting person is to give them a little bit of carbohydrate, which blocks all of the body's protective mechanisms (yet we do this in the hospitals with the glucose IV infusions). The same is true of people trying to lose weight: a little carbohydrate shuts down the production of beta-hydroxybutyrate and encourages the loss of protein from muscle to maintain blood sugar. The ketosis also reduces your appetite.

(b) *Reducing Calories Increases Health (and Happiness)*

Fasting lowers insulin and insulin-like growth factor-1 (IGF-1) and other markers of aging and tumor growth. Rodents fed a low calorie diet or alternate day feedings not only live longer, they are more resistant to developing brain-damaging diseases similar to Parkinson's and Alzheimer's diseases in response to brain toxins.

(c) *Beta-hydroxybutyrate: the Perfect Fuel for Reducing Aging and Maintaining Health*

Beta-hydroxybutyrate (the main fuel we produce as we burn fat on a very-low-carbohydrate diet) has many protective effects. It inhibits proteolysis (the breakdown of protein, thereby preventing the loss of muscle) and protects against oxygen deprivation (rats in ketosis survive 3-4 times longer than non-ketotic rats in a low oxygen environment). This reduced oxygen requirement could be very helpful in patients with stroke, heart attacks and other vascular injuries.

Beta-hydroxybutyrate is a more efficient source of energy than glucose; in the isolated rat heart preparation beta-hydroxybutyrate was shown to have the following effects: 25% increase in contractility and efficiency and a 20% decrease in oxygen consumption. It has also been shown to increase cellular energy production while simultaneously decreasing oxidative stress and cell damage. It is associated with increased levels of Coenzyme Q-10 production in the mitochondria and has been shown to reduce apoptosis (programmed cell death) and possibly aging.

3 What is a Ketogenic Diet?

A ketogenic diet is one in which your body uses fat as fuel instead of sugar. Seventy percent of your calories must be consumed as fat, with 15-25% as protein and 5-10% as carbohydrates. Within a few days your body begins to produce ketoacids including beta-hydroxybutyrate (BHB) which can efficiently fuel all cells in the body including the brain. You can check to see if you are burning fat (and therefore you are in ketosis) by checking your urine for ketones using Ketostix strips. All you need is trace to 1+ to effectively be burning fat.

(a) *Why is burning fat instead of sugar good for your body?*

As discussed above, consuming less oxygen produces less oxidative stress. Burning fat as the major fuel improves cellular energy cycles with increased Coenzyme Q-10 levels and protection of mitochondrial DNA as well as less buildup of toxins in the body. Ketosis also protects the brain from the effects of low blood sugar (hypoglycemia) and low oxygen states (such as during stroke or heart attacks) which also may reduce aging.

The brain can use beta-hydroxybutyrate as the major fuel source during ketosis. This was shown in a study of subjects undergoing 30 days of starvation for weight loss (under medical supervision). During starvation, blood levels of beta-hydroxybutyrate were higher than glucose levels. When subjects were given an insulin infusion their blood sugars dropped to extremely low levels without central nervous system side effects. Beta-hydroxybutyrate levels were maintained despite the insulin infusion and protected against symptoms of hypoglycemia.

People who can be helped by the ketosis diet (the Mediterranean Hunter-Gatherer diet) include those with lung disease (reduced oxygen requirement), heart failure (improved cardiac efficiency), and multiple trauma victims (reduced oxidative stress and oxygen requirement). Other include patients needing weight loss, diabetes type 1 and 2 (reduced impact of hypoglycemia and improved weight loss) and children and adults with seizures. The ketosis diet is also being studied in patients with ADD, depression and bipolar disorders.

(b) *What are the complications of the ketogenic diet?*

The ketogenic diet is not new. Pediatric neurologists have been using the ketogenic diet for 70 years without serious side effects in children with refractory seizures. Recent studies include patients with Rheumatoid arthritis, diabetes and heart disease as well as some psychiatric problems.

Constipation is one problem that can be seen, so drink more water and make sure you are getting enough fiber (20-30 grams per day is ideal). If you are not going to eat the green leafy vegetables such as kale, collards, mustard greens, cauliflower or broccoli, then you need to take a fiber supplement. Supplementing with magnesium also helps. The nuts have a fair amount of fiber but also have digestible carbohydrates.

Kidney stones are another problem so again drink more water (which prevents stone formation). There is no evidence that the ketogenic diet affects bone health in children or adults. There are no adverse affects on the kidneys and liver (this is not a high protein diet- only 15-25% calories are from protein).

(c) ***What effect does the ketogenic diet have on risk factors for cardiovascular disease?***[82]

In most patients there is an improvement in cardiovascular risk factors as follows:

- Fasting serum insulin levels 34% lower (good)
- HDL increased 11% while LDL remained stable (good)
- LDL particle size became less dense (good)
- Lipoprotein (a) levels are lower (good)

In patients with diabetes and those with genetically high cholesterol (Familial Hyperlipidemia), the increased intake of cholesterol and saturated fat may raise cholesterol levels. In these patients it is important to monitor the LDL cholesterol levels after starting the ketogenic diet. As patients lose weight and as their diabetes improves or resolves, the LDL will drop back into a good range. In some patients I will start a lipid-lowering medication until we get the circumference of the waist down, with the plan of eventually stopping this medication as we meet our goals.

(d) ***How do I eat a ketogenic diet?***

First, it is important to eat a well-balanced diet. Start the day with protein with healthy fat (no carbs)- Organic Italian Turkey Sausage or 3 eggs cooked "over easy" or "sunny side up" in olive oil or butter (or with organic turkey bacon). Take your supplements: chromium, magnesium, MSM, and cod liver oil (that's all you really need for the time being). The cod liver oil gives you healthy fat and helps balance the Omega 3/Omega 6 ratio of fats as well as all of the vitamin D you could need (don't take too much extra vitamin D, but the sun is ok).

Continue lunch with mostly protein with healthy fat (almost no carbs)- Tuna salad made with grape seed oil mayonnaise with celery. This will keep you in ketosis from morning

[82] Sharman MJ, Kraemer WJ et al. *Journal of Nutrition* 2002 Jul;132(7):1879-85.

to late afternoon. Add some nuts for a mid-afternoon snack- macadamia and Brazil nuts are the lowest in carbs.

For dinner have meat/fish/poultry with a salad/olive oil dressing and a low starch green leafy vegetable such as broccoli or mixed greens. Coffee is fine, but no sugar or half-and-half (a little heavy cream, however, is ok). A dry wine (1-2 glasses) or Miller Lite (1-2 cans) is acceptable (you'll have to not eat other carbs if you are going to stay in ketosis doing this).

Use Ketostix to see how you are doing (are you cheating too much or just enough?). These are urine dipsticks, which check your urine for ketones. You want to have a result of at least trace ketones. If you are negative for ketones, you pushed the envelope too hard with carbohydrates. Regroup and try it again.

(e) ***What foods do I eliminate?***

- Eliminate all grains (wheat, rice, oats, corn, barley, rye, etc) including all baked goods, breads and pasta, crackers. If it is made with flour, do not eat it.
- Eliminate all beans (mostly starch)
- Eliminate all potatoes, fries, chips, sweet potatoes, etc
- Eliminate most dairy (except heavy cream and butter)
- Eliminate all sugar
- Eliminate all sweet and dried fruit and fruit juices (one medium apple has more sugar than you can have in a whole day (equivalent to 8 glasses of wine!)
- Eliminate all processed foods (anything that comes in a package)

(f) ***How many grams of carbohydrate can I eat and still be in ketosis?***

Only you can determine what level will keep you in ketosis (that is why you check your urine for ketones as feedback). If you do not have ketones in your urine, you have eaten too many carbohydrates. A good rule is to try to stay less than 20 grams of digestible carbohydrate per day (not counting fiber).

If you want to gain a little weight, add more low sugar fruits. This is what the original hunter-gatherers did in the autumn, as all of the fruits became ripe in the fall. They would fatten up for the long winter of eating only meat and fat.

4 Isn't this Atkins' Diet?

(a) *What is wrong with the Atkin's diet?*

The hormones and antibiotics in conventional meat and dairy products likely will cause other adverse health effects.

- Green leafy vegetables provide important nutrients. The diet can be designed to include these and still maintain ketosis.
- The consumption of nitrites in cured meats such as bacon and ham is highly associated with the development of colon cancer.
- The consumption of dairy products will worsen allergic symptoms and asthma in many people. Dairy should be avoided in all patients with asthma, recurrent sinusitis, frequent colds and bronchitis.
- Dr. Atkins provided the average person with an option for improving health in the real world of fast food. There are, however, better options to living well and feeling good.

(b) *What is right about the Atkin's diet?*

The study at Duke using the Atkin's program has shown the following results:

- 95% of patients report more energy.
- 87% of patients report less heartburn.
- 85% of patients report improved mood.
- Average weight loss was 22 pounds.
- All parameters of heart disease risk improved: LDL-cholesterol levels dropped while HDL-cholesterol levels went up, triglycerides dropped and blood sugar levels improved.

Allergies are an Indication of Inflammation

Inflammation Leads to Heart Disease and Cancer

So Don't Ignore or Treat Your Allergies

Make Them Go Away

12

REASONS TO AVOID COW'S MILK

1 Make Your Allergies and Asthma Go Away!

(a) *The Allergic Response*

In my clinical practice I have found food sensitivities to be much more common than I had ever expected. Milk, peanut, and wheat allergies are causing some of the allergic rhinitis, asthma, and rashes that I see. Patients have been able to stop 2 or even 3 prescription drugs after eliminating offending items, then developing symptoms again when re-challenging themselves.

(b) *Much of our allergies and asthma are related directly to the food we eat*

When our son was five years old, he developed asthma (both my wife and I had asthma as children). We cleaned the house, took out the rugs, and put in the HEPA filters. He got better and then worse again. He was diagnosed with pneumonia twice and had chronic congestion and a nocturnal cough. He was using two inhalers. Nothing we did seemed to make much difference.

One of my patients had suggested I buy the book Optimal Wellness by Ralph Golan, M.D. He said it had good sections on hypoglycemia and food allergies. Twice I went to buy the book and twice I left without it because the information seemed so foreign. I was reluctant because if Dr. Golan was right, then I was ignorant of (and resistant to) what he was suggesting.

I finally did buy the book. Dr. Golan suggests that at least some of asthma and allergies are on the basis of food allergies. Our son John (who was now six years old) and I went to an organic food store and bought the foods that Dr. Golan suggested we substitute for our usual diet (John and I did this together). Over the next two weeks John's cough, congestion, and wheezing went away. As we added foods back, John began coughing after

eating peanut butter crackers. When we got to milk, his eyes began burning and he cried. John is now eleven years old and has put his inhalers away ever since changing his diet. And this was a kid who had lived on all the foods he was allergic to, including string cheese, yogurt, cereal with milk, ice cream, pizza, macaroni and cheese, and peanut butter crackers.

Most people will notice that drinking milk gives them more mucus. Singers are told to avoid milk before concerts to reduce congestion. Athletes are told to avoid all milk products before sporting events to reduce secretions. What are our bodies telling us by this? Don't drink milk.

(c) ***How do foods cause allergic symptoms?***

It appears that large proteins absorbed through our gut stimulate our immune system and initiate much of the allergic response we see in the upper and lower respiratory tracts. The large proteins in milk and peanuts had apparently stimulated our son's immune system to react to dust, mold, and animal dander in his local environment. We could not eliminate the dust, mold, mildew, and mouse dander adequately from our old house but we could modify his diet, which in his case has done the trick.

And this trick has worked over and over again in my patients. The most common offenders are milk proteins (casein and lactalbumin), wheat protein (gluten), and peanuts, as well as the sulfites in wine, and the proteins in orange juice and corn. My patients report that they have stopped all of their allergy and/or asthma medications and only need them if they cheat (i.e. Pizza and ice cream in milk-allergic, or flour-based products in wheat-allergic).

One patient with this was a surgeon from Europe in his mid thirties with a history of asthma since childhood. He was very doubtful, but after he eliminated the twelve most common foods that cause an allergic response, his asthma was gone. When he again tried wheat, orange juice and red wine (using the elimination and reintroduction diet), his asthma symptoms returned. Since avoiding these, his asthma has resolved and he no longer needs his inhalers (and his peak flow is normal).

The former chairman of Pediatrics at The Johns Hopkins School of Medicine authored a book entitled Don't Drink Your Milk (by Dr. Oski). He reported on his significant clinical experience that milk, wheat, peanut, oranges, wine, etc. initiate an abnormal immune response in many individuals causing recurrent ear infections, asthma, and gastrointestinal problems. More on the elimination diet later.

(d) *Don't Drink Your Milk (if you have allergies, asthma, or head congestion)*

The Dairy Council has done a wonderful job of marketing milk as an important calcium source. The Harvard Nurses Health study showed that the more milk women drank, the more fractures they had (in this study of 74,000 women, the women who drank three glasses of milk per day had more fractures than those who rarely drank milk did). There are many healthier calcium sources, such as the green leafy vegetables and sardines, etc. If you aren't going to base your major calorie intake on green leafy vegetables, then I suggest one or two calcium/ magnesium supplements per day (see chapter on Nutritional Supplements).

Milk has also been associated with ovarian cancer, juvenile-onset diabetes mellitus, and cataracts. I encourage my patients with allergies and those feeling less than great to eliminate milk. Eliminating wheat (wheat flour-based foods) is also healthier for many people. This consists of eating a whole food diet, eliminating all processed and packaged foods that you cannot identify the contents.

2 The Most Common Foods Associated with Symptoms of Sensitivity

- Headaches: wheat, chocolate, MSG, nuts, wine, cheese, eggs, milk, citrus fruits
- Allergic rhinitis (hayfever): milk, wheat, peanuts, chocolate, sulfites in wine
- Hives: strawberries, tomatoes, chocolate, eggs, shellfish, mangoes, pork, peanuts, nuts
- Asthma: milk, wheat, tartrazine (FDA yellow dye #5), aspirin, peanuts, orange juice, sulfites in wine, wine vinegar and Balsamic vinegar
- Hyperactivity, poor attention: corn, wheat, milk, soybeans, beer (grains- hops, barley)
- Eczema: eggs, citrus fruits, tomatoes

(a) ***Milk Makes More Mucus*** *(so does wine, orange juice, and chocolate)*

Milk allergy and asthma is a well-known association in children. Athletes and singers are consistently told to avoid milk products before important engagements because they often increase airway congestion and secretions. So why do we encourage people to consume a substance otherwise foreign to their existence after weaning (for the USDA and the economy of course!)? Contrary to the popular belief that we outgrow our allergy to milk as we grow older, it can manifest itself in different ways in adults. These can include allergic rhinitis, chronic fatigue and chronic low-grade depression. I have seen many patients (including my six year old son and a 35 year old surgeon from Denmark) have their symptoms resolve completely following the exclusion of the offending food, most commonly milk, wheat, sulfites and peanuts.

(b) ***Milk Products Are Everywhere*** *(and take an effort to avoid)*

- Milk, cheese, yogurt, ice cream
- Cream in your coffee (the hardest for me to give up), Lattes
- Pizza
- Bagel and cream cheese
- Cottage cheese
- Baked goods with casein (the milk protein that promotes allergy)
- Protein drinks with casein
- Any food with casein listed on the ingredients
- Lactaid products still have the allergenic proteins

(c) ***What are the options?***

- Fresh or frozen berries in a smoothie (with heavy cream?) for dessert instead of ice cream
- What?! For pizza? Is there no acceptable substitute? Won't the anchovies protect me?

3 The Allergy-Addiction Connection

The allergic response to foods causes the release of adrenaline and endorphins (morphine-like substances) that give us an energy boost and a greater sense of well being and creativity. This can be followed by a crash. If the suspected allergen is not eaten we can get a mild withdrawal reaction making us crave the food. The foods we crave (even if the craving is very subtle) can be the very foods making us feel less than great to begin with (causing fatigue and depressed mood). Common substances associated with this reaction are listed below. You may not want to release your substance, but at least you will understand your body and it's reaction.

Foods associated with Allergy-Addiction.

Alcoholic beverages, particularly beer and wine
Chocolate, Coffee, Tobacco
Corn, wheat, and other grains

People can tend to binge on these substances because of the heightened sense of well being and productivity, making elimination difficult. If these substances are also causing significant head congestion, asthma, headaches, or eczema, it may be worth the decreased productivity for a more livable life.

4 The Other Side of Soy

Patients told me not to recommend soy. Soy contains substances that can promote abnormal thyroid growth and goiter. There are substances that interfere with protein digestion. In addition, the acid-extraction procedure that is used to process soymilk and tofu oxidizes and hydrolyzes the proteins. Fermented soy products (Miso), in contrast, are ok because these are not acid-extracted and the bacteria break down the substances that cause the above problems. Consider almond-milk or rice-milk although these are very high in carbs.

5 The Food Rotation Diet

Eating the same foods habitually may also stimulate the immune system. It is good to vary your diet. Small amounts of irritating foods eaten intermittently are much less likely to cause a problem. But if you already have developed sensitivity, complete avoidance for several weeks to months may be required to reduce the reaction and allow health to return.

Allergy Elimination Diet

You may eat the following:

- Most fruits, except citrus
- Most vegetables, except corn, tomatoes, potatoes, eggplant
- Brown or white rice
- Turkey
- White fish-flounder, sole, halibut
- Almonds, walnuts, sunflower seeds

Avoid the following:

- All wheat products
- All dairy products

All foods you think you might be sensitive to: especially peanuts, certain nuts, eggs, chocolate, banana, mango, pork, beef, chicken, beer, wine, yeast, or potatoes.

Of 367 asthmatic children, 257 had a history of symptoms triggered by specific foods. Double blind, placebo controlled oral food challenges confirmed 63% of them. Wheat, eggs, soy, nuts, dairy were the most common triggers. [83]

[83] Bock SA. In: Tinkelman DG, Naspitz CK, eds. *Childhood Asthma: Pathophysiology and Treatment*. New York: Marcel Dekker; 1993:537-551.

If You Are Living in the Desert,

Eat Grains

Otherwise, Avoid the Pasta and Bread

13

WHAT'S WRONG WITH WHEAT

1 There is no Wheat or Corn in the Mediterranean Hunter-Gatherer Diet

Why would I suggest we eliminate wheat from our diet? Could it be because pasta and bread are quickly metabolized to simple sugars and rapidly raise blood sugar and insulin levels? Or is that some of my patients get headaches and asthma from wheat? Or that not eating wheat is associated with lower blood pressure in some patients. Some people are as attached to their pasta and bread as the alcoholic is to his alcohol? Sure, but I find the following studies to be both interesting and disturbing:

(a) *Wheat gluten (the protein in wheat) promotes the development of diabetes in mice*

Mice bred to develop non-obese diabetes (NOD mice) who were fed a gluten free diet developed diabetes much less frequently (only 15% did, compared to 64% on a diet containing gluten). And the 15% who did develop diabetes did so at a much older age (244 days vs. 197 days- a long time for a mouse). Both groups were fed the same milk protein and vitamin content.[84]

In mice and pigs (*we are genetically very similar to pigs*), gluten binds to the insulin receptors; at low levels gluten increases glucose utilization (weight gain), at higher levels gluten inhibits glucose utilization (insulin resistance).

(b) *So why am I worried about some mice and pigs?*

Seven to ten percent of patients with type 1 diabetes (the type similar to NOD mice) have celiac disease (gluten sensitive enteropathy- inflammation of the intestine due to

[84] Funda DP, Kaas A, Bock T, Tlaskalova-Hogenova H, Buschard K. Gluten-free diet prevents diabetes in NOD mice. *Diabetes Metab Res Rev* 1999 Sep-Oct;15(5):323-7.

sensitivity to wheat protein). Only 1/100-200 people without type 1 diabetes have celiac disease.[85] Eleven percent of patients with untreated Celiac disease have autoantibodies against the pancreatic islet cells (the cells that produce insulin; their destruction produces diabetes). These autoantibodies often disappear with the avoidance of gluten. (fourteen percent have autoantibodies against the thyroid, many of whom develop thyroid disease).[91]

Fifty-three percent of untreated patients with Celiac disease have autoantibodies, while only 20% of treated patients (avoiding wheat gluten) have autoantibodies (i.e. autoimmunity improves or resolves off wheat). What is interesting is that it appears we may be able to calm the immune system by changing our diet.

The reason this is important is because NOD mice treated with anti T-cell therapy (eliminates the immune cells that destroy pancreatic cells) regrow their pancreatic islet cells and no longer have diabetes (amazing- the potential to regrow islet cells is not lost!!! The immune system is just suppressing their growth).

Summary: If you have diabetes, thyroid disease, or other autoimmune disorder, it is probably a good idea to avoid wheat gluten.

(c) ***Wheat and Crohn's disease (another inflammatory bowel disease)***

Cereals (wheat and corn) and dairy products have been shown to worsen Crohn's disease, and the elimination of these improves all parameters. In refractory patients that are unresponsive even to high dose steroids, an elemental diet produces remission in 90% of these patients.[86]

Dietary lectins (proteins of grains-particularly corn and wheat) have been associated with bowel inflammation and the promotion of autoimmune diseases including Rheumatoid arthritis. It has been shown that removal of the bowel inflammation improves the other manifestations of autoimmunity.[87]

(d) ***Gluten Exorphin A-5 is a morphine-like substance from wheat gluten***

Could the eating of wheat actually be addictive? No wonder patients complain if you try to take away their pasta and bread.

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[85] Ventura A, Neri E, Ughi C, Leopaldi A, Citta A, Not T.J Gluten-dependent diabetes-related and thyroid-related autoantibodies in patients with celiac disease. *Pediatr* 2000 Aug;137(2):263-5.

[86] Hunter JO. Nutritional factors in inflammatory bowel disease. *Eur J Gastroenterol Hepatol* 1998 Mar;10(3):235-7.

[87] Cordain L, Toohey L, Smith MJ, Hickey MS. Modulation of immune function by dietary lectins in rheumatoid arthritis. *Br J Nutr* 2000 Mar;83(3):207-17.

Gluten Exorphin A-5 is an opioid (morphine-like) peptide sequence of 5 amino acids, which recurs 15 times in each molecule of gluten. It is released by protein digestion in the stomach and small intestine. Both oral and intravenous A-5 produce central and peripheral nervous system effects on learning and response similar to narcotics. These effects also seen in gluten feed mice (i.e. digestion release these exorphins which are then absorbed). Effects blocked by narcotic antagonists (medications that block the effects of narcotics).

There is an association of gluten intolerance and autoantibodies with schizophrenia, psychosis, and degeneration of the part of our brain which controls balance (the cerebellum).[88]

(e) *Wheat and Colon Cancer*

The consumption of certain food groups is associated with increased colorectal cancer in Italy and France (countries that pride themselves on their pasta and bread).[89] [90] Look below at Table 13-1. The people who ate the most cereal, rice and bread had a doubling of their risk of colorectal cancer. A risk of 2.0 suggests a doubling of risk. A risk of 1.7 suggests a 70% increase in risk.

[88] Harper DN, Nisbet RH, Siegert RJ. Dietary gluten and learning to attend to redundant stimuli in rats. *Biol Psychiatry* 1997 Dec 1;42(11):1060-6.
[89] Franceschi S, Favero A, La Vecchia C, Negri E, Conti E, Montella M, Giacosa A, Nanni O, Decarli A. Food groups and risk of colorectal cancer in Italy. *Int J Cancer* 1997 Jul 3;72(1):56-61.
[90] Boutron-Ruault MC, Senesse P, Faivre J, Chatelain N, Belghiti C, Meance S. Foods as risk factors for colorectal cancer: a case-control study in Burgundy (France). *Eur J Cancer Prev* 1999 Jul;8(3):229-35.

TABLE 13-1

The Association of Wheat and Other Foods with Colorectal Cancer

Italy (risk ratio)	**France** (risk ratio)	**Food Group** (from highest to lowest risk foods)
	2.4	Deli meats (People who ate the most deli meats had 140% more colon cancer than the average person in France)
1.7	2.0	Cereals, rice, bread (Large consumers of starches had 70-100% more cancer than average in Italy and France)
1.4		Refined sugar (Excess sugar consumers had 40% more cancer)
1.2		Potatoes (Excess potatoes increased risk by 20%)
1.1		Cakes and desserts (Great consumers of cakes had 10% more cancer)
1.0	1.0	Fresh meat (Excess intake of meat did not change cancer risk)
1.0		Alcohol (Alcohol intake did not seem to help or hurt on average)
0.7	1.0	Fish (A suggestion of possible decrease in cancer risk if you eat a lot of fish)
0.7		Fresh fruit other than citrus (Consuming more fruit was much safer than consuming more sugar and starches)
0.6	0.3	Raw or cooked vegetables (The people who ate the most of their vegetables had 40-70% less cancer than average- sign me up!)

The people who ate the most raw or cooked vegetables had a 30% to 70% reduction in colorectal cancer. A risk of less than 1.0 suggests a reduction in risk of colon cancer (fish, fruits, vegetables). There were 20% fewer colon cancers in people who ate one serving of vegetables per day.

There was only a slight increased risk in patients who ate the most cakes and desserts. So it appears you can have your cake and eat it too, but just not the pasta and bread (I would stick to oatmeal-raisin cookies).

(f) ***Other cancers are also promoted by a high starch and sugar diet***

The Harvard Nurses Health Study has confirmed these findings in that pancreatic cancer occurred four times as often in the women who ate the most rice and potatoes. Pancreatic cancer, breast cancer, prostate cancer and colon cancer have all been shown to be promoted by a high sugar/starch diet.

Could the consumption of wheat flour promote?

- Diabetes
- Inflammatory bowel disease
- Celiac disease
- Irritable bowel syndrome
- Colorectal cancer
- Schizophrenia

Studies referenced below suggest this may be true.

Cordain L, Miller JB, Eaton SB, Mann N, Holt SH, Speth JD. Plant-animal subsistence ratios and macronutrient energy estimations in worldwide hunter-gatherer diets. *Am J Clin Nutr* 2000 Mar;71(3):682-92.

Both anthropologists and nutritionists have long recognized that the diets of modern-day hunter-gatherers may represent a reference standard for modern human nutrition and a model for defense against certain diseases of affluence. Because the hunter-gatherer way of life is now probably extinct in its purely un-Westernized form, nutritionists and anthropologists must rely on indirect procedures to reconstruct the traditional diet of preagricultural humans. In this analysis, we incorporate the most recent ethnographic compilation of plant-to-animal economic subsistence patterns of hunter-gatherers to estimate likely dietary macronutrient intakes (% of energy) for environmentally diverse hunter-gatherer populations. Furthermore, we show how differences in the percentage of body fat in prey

animals would alter protein intakes in hunter-gatherers and how a maximal protein ceiling influences the selection of other macronutrients.

Our analysis showed that whenever and wherever it was ecologically possible, hunter-gatherers consumed high amounts (45-65% of energy) of animal food. Most (73%) of the worldwide hunter-gatherer societies derived >50% (> or =56-65% of energy) of their subsistence from animal foods, whereas only 14% of these societies derived >50% (> or =56-65% of energy) of their subsistence from gathered plant foods. This high reliance on animal-based foods coupled with the relatively low carbohydrate content of wild plant foods produces universally characteristic macronutrient consumption ratios in which protein is elevated (19-35% of energy) at the expense of carbohydrates (22-40% of energy).

Funda DP, Kaas A, Bock T, Tlaskalova-Hogenova H, Buschard K. Gluten-free diet prevents diabetes in NOD mice. *Diabetes Metab Res Rev* 1999 Sep-Oct;15(5):323-7.

Epidemiological as well as animal studies have shown that environmental factors such as nutrition contribute to the development of diabetes. In this study we investigated whether the early introduction of a gluten-free diet can influence the onset and/or incidence of diabetes, as well as insulitis and the number of gut mucosal lymphocytes, in non-obese diabetic (NOD) mice. METHODS: Gluten-free and standard Altromin diets (with the same milk protein and vitamin content) were given to breeding pairs of NOD mice as well as to the first generation of NOD female mice, which were then observed for 320 days.

RESULTS: A substantially lower diabetes incidence (chi(2)=15.8, p=0.00007) was observed in NOD mice on the gluten-free diet (15%, n=27) compared to mice on the standard diet (64%, n=28). In addition, mice on the gluten-free diet developed diabetes significantly later (244+/-24 days SEM) compared to those on the standard diet (197+/-8 days, p=0.03). No differences in the number of CD3(+), TCR-gammadelta(+), IgA(+), and IgM(+) cells in the small intestine were observed.

CONCLUSION: We showed that gluten-free diet both delayed and to a large extent prevented diabetes in NOD mice that have never been exposed to gluten.

Ventura A, Neri E, Ughi C, Leopaldi A, Citta A, Not T. Gluten-dependent diabetes-related and thyroid-related autoantibodies in patients with celiac disease. *Pediatr* 2000 Aug;137(2):263-5.

Patients with celiac disease are at high risk of having autoimmune disorders. Moreover, untreated patients with celiac disease have been found to have a higher than expected prevalence of organ-specific autoantibodies. In a prospective study of 90 patients with celiac disease, we found that the prevalence of diabetes and thyroid-related serum antibodies was 11.1% and 14.4%, respectively. Like antiendomysium autoantibodies, these organ-specific antibodies seem to be gluten-dependent and tend to disappear during a gluten-free diet.

De Vitis I, Ghirlanda G, Gasbarrini G. Prevalence of coeliac disease in type I diabetes: a multicentre study. *Acta Paediatr Suppl* 1996 May;412:56-7.

The aim of this study was to point out the prevalence ratio and the clinical presentation of coeliac disease (CD) in a large group of insulin-dependent diabetes mellitus (IDDM) patients. PATIENTS AND METHODS: 1114 patients affected by IDDM were screened for CD using antigliadin and antiendomysium antibodies. Patients who were positive for at least one test underwent an endoscopic biopsy of the descending duodenum in order to verify the presence of villous atrophy. Subjects with CD started a gluten-free diet and underwent a clinical follow up.

RESULTS: Villous atrophy was found in 63 patients (5.6%). Among the Italian population, the rate was 7%. Twenty-four percent of coeliac patients presented with diarrhea, while 22% were completely symptom-free. A significant correlation was found between the presence of villous atrophy and the duration and onset of diabetes.

CONCLUSIONS: The prevalence of CD in IDDM is higher than previously reported, although the ratio range in different centers from 1.7 to 10%, probably due to both environmental and genetic factors. Twenty-two percent of coeliac patients were completely symptom-free. The prevalence seems to be significantly related to the duration and onset of IDDM.

Cordain L, Toohey L, Smith MJ, Hickey MS. Modulation of immune function by dietary lectins in rheumatoid arthritis. *Br J Nutr* 2000 Mar;83(3):207-17.

Despite the almost universal clinical observation that inflammation of the gut is frequently associated with inflammation of the joints and vice versa, the nature of this relationship remains elusive. In the present review, we provide evidence for how the interaction of dietary lectins with enterocytes and lymphocytes may facilitate the translocation of both dietary and gut-derived pathogenic antigens to peripheral tissues, which in turn causes persistent peripheral antigenic stimulation. In genetically susceptible individuals, this antigenic stimulation may ultimately result in the expression of overt rheumatoid arthritis (RA) via molecular mimicry, a process whereby foreign peptides, similar in structure to endogenous peptides, may cause antibodies or T-lymphocytes to cross-react with both foreign and endogenous peptides and thereby break immunological tolerance.

By eliminating dietary elements, particularly lectins, which adversely influence both enterocyte and lymphocyte structure and function, it is proposed that the peripheral antigenic stimulus (both pathogenic and dietary) will be reduced and thereby result in a diminution of disease symptoms in certain patients with RA.

Franceschi S, Favero A, La Vecchia C, Negri E, Conti E, Montella M, Giacosa A, Nanni O, Decarli A. Food groups and risk of colorectal cancer in Italy. *Int J Cancer* 1997 Jul 3;72(1):56-61.

The proportion of colorectal cancer attributed to dietary habits is high, but several inconsistencies remain, especially with respect to the influence of some food groups. To further elucidate the role of dietary habits, 1,225 subjects with cancer of the colon, 728 with cancer of the rectum and 4,154 controls, hospitalized with acute non-neoplastic diseases, were interviewed between 1992 and 1996 in 6 different Italian areas. The validated food-frequency questionnaire included 79 questions on food items and recipes, categorized into 16 food groups.

After allowance for non-dietary confounding factors and total energy intake, significant trends of increasing risk of colorectal cancer with increasing intake emerged for bread and cereal dishes (odds ratio [OR] in highest vs. lowest quintile = 1.7), potatoes (OR = 1.2), cakes and desserts (OR = 1.1), and refined sugar (OR = 1.4). Intakes of fish (OR = 0.7), raw and cooked vegetables (OR = 0.6 for both) and fruit other than citrus fruit (OR = 0.7) showed a negative association with risk. Consumption of eggs and meat (white, red or processed meats) seemed uninfluential. Most findings were similar for colon and rectum, but some negative associations (i.e., coffee and tea, and fish) appeared stronger for colon cancer.

Our findings lead us to reconsider the role of starchy foods and refined sugar in light of recent knowledge on the digestive physiology of carbohydrates and the insulin/colon cancer hypothesis. The beneficial role of most vegetables is confirmed, with more than 20% reduction in risk of colorectal cancer from the addition of one daily serving.

Boutron-Ruault MC, Senesse P, Faivre J, Chatelain N, Belghiti C, Meance S. Foods as risk factors for colorectal cancer: a case-control study in Burgundy (France*).* *Eur J Cancer Prev* 1999 Jul;8(3):229-35.

Although the high meat-low vegetable diet is considered the reference high-risk diet for colorectal cancer, particularly in USA communities, other at-risk dietary patterns, such as high intakes of processed meat and refined carbohydrates are emerging. Little is known about risk factors for colorectal cancer in France, a country at high risk of rectal cancer and moderately high risk of colon cancer. We compared diet of colorectal cancer cases (n = 171) and general population controls (n = 309) in Burgundy (France). Categories of intake were established by sex and based on the distributions of food intakes in controls.

Odds ratios for the fourth Vs first quartile of intake (OR4) were 2.0 (1.1-3.6) for refined cereal products (rice, pasta and pastry), 2.4 (1.3-4.5) for delicatessen, 2.3 (1.2-4.2) for pates, 1.7 (1.1-2.8) for offal and 2.1 (1.1-4.0) for butter, lard and cream. There was no association with consumption of fresh meat (OR4 = 1.2), fish (OR4 = 1.5), egg (OR4 = 1.1) or dairy products (OR4 = 1.0). A protective effect of vegetables was only observed for left colon cancer (OR3 = 0.3; 0.1-0.6). In men, the most significant risk factors were refined cereal

products, seasoning animal fats, chocolate and coffee, whereas risk factors were delicatessen, fat meat, pasta, rice, and chocolate in women.

The strong association with refined cereal products is consistent with the hypothesis of a role of hyperinsulinism in colorectal carcinogenesis. The association with processed but not fresh meat suggests the importance of exogenous carcinogenesis in that area.

Deneo-Pellegrini H, De Stefani E, Ronco A. Vegetables, fruits, and risk of colorectal cancer: a case-control study from Uruguay. *Nutr Cancer* 1996;25(3):297-304.

To examine whether vegetable and fruit intake modify colorectal cancer risk, a case-control study was conducted in Uruguay. Dietary patterns were assessed in detail (for cases before diagnosis or symptoms occurred) by use of a food frequency questionnaire on 61 food items, which allowed the calculation of total energy intake. Nutrient residuals were calculated through regression analysis. After adjustment for potential confounders (which included body mass index, total energy, and total alcohol intake), a reduction in risk for total vegetable intake, total fruit intake, and lettuce, apple, and banana consumption was observed. The strongest protection was observed for banana intake (odds ratio 0.28; 95% confidence level 0.16-0.50) for consumption in the third tertile compared with the first.

Hunter JO. Nutritional factors in inflammatory bowel disease.

Eur J Gastroenterol Hepatol 1998 Mar;10(3):235-7.

During the past 20 years there has been growing interest in the importance of nutritional factors in the pathogenesis of inflammatory bowel disease. There are so far no definite links between ulcerative colitis and diet, but both epidemiologists and clinicians have studied links with Crohn’s disease. Epidemiological studies, although retrospective, have suggested that patients with Crohn's disease eat more sugar and sweets that control individuals; however, when dietary sugar is restricted, there is little clinical benefit. The clinical approach to nutrition in Crohn's disease has been by the use of elemental diets, which will produce symptomatic and objective remission in up to 90% of compliant patients. Those who return to normal eating soon relapse but, in some studies, have enjoyed prolonged remission on exclusion diets.

The foods excluded have been not sugar, **but predominantly cereals, dairy products and yeast**. Attention has now switched to the possible harmful role of fat in Crohn's disease. The efficacy of elemental feeds appears to depend not on the presentation of nitrogen but on the amount of long chain triglyceride present. Increases in recent years in the frequency of Crohn's disease in Japan have been correlated with increased dietary fat intake, and a recent study suggested that W-3 fatty acids, which are metabolized by immunomodulatory leukotrienes and prostaglandins, may have a beneficial role to play. The links between nutrition and Crohn's disease have now become strong and the role of fat may be the most exciting of all.

A Little Alcohol Appears to be Good

More is not Better

A Lot is Definitely Bad

14

THE MODERATE DRINKING OF ALCOHOL

1 Paths of Escape

When in the course of life we find ourselves feeling trapped by our circumstances and choices, is it not ok to try to take the pressure off by opening up potential options for a temporary escape?

- To allow us to keep our commitments.
- To allow us to stay interdependent without losing our minds.

(a) *What are the potential paths of escape?*

- Exercise, be it jogging, walking the dog, tennis, yoga, Tai Chi, etc. are excellent and natural ways of releasing endorphins and increasing our sense of well-being and fitness.
- Reading to escape to new and different worlds (*But who will empty the dishwasher?).*
- Working all the time is effective but may remove us too much from our interdependence.
- Cigarettes can take the edge off (*by releasing endorphins and adrenaline*) but are destructive to our tissues and promote aging.
- Cheating on your spouse is also destructive and to be avoided (*But can we flirt just a little, please?).*
- Narcotics and cocaine are much too potent (*Animals will choose cocaine over food until they starve to death*). Avoid at all costs.
- A little apple cider.

(b) *A Little Apple Cider*

Johnny Appleseed (*John Chapman was his real name*) introduced apple trees to much of the new world along the Ohio River in the early 19th century. But the trees he propagated produced small tart apples suitable only for making cider, which then fermented to hard cider

(*alcohol content of 5% or a little more*). And each homestead was required by land grant to set out at least fifty apple or pear trees. This meant that each farm was capable of producing 2,000 gallons of cider per year (*for personal use?*). Due to the pollution of the rivers, often the cider was the safest thing to drink, even for the young people. The puritans approved of cider because it came from the American apple rather than the sinful grape.

It was not until this century that we began planting grafted apple trees capable of producing the sweet apples we know today. In fact, all Granny Smith apples have come from the same tree, which has been reproduced by taking a small twig and grafting it onto a stem of another apple tree. The few apple varieties we have now were selected for their high sugar contents. Granny Smith apples are now the closest apple you can get to the original American apples (*in terms of tartness*) except for crabapples and wild apples. But don't eat too many modern apples because they are loaded with sugar (*by design*).

(c) *The Good of Alcohol*

But getting back to alcohol, there is much evidence associating the moderate use of alcohol (*see definition below*) with increased longevity and decreased heart disease. Alcohol intake is associated with a decreased incidence of coronary heart disease (*heart attacks*) among men and women and among patients with diabetes and those with previous heart attacks or heart failure. Moderate alcohol consumption appears to inhibit IL-6 production or activity (*Interleukin-6 induces an inflammatory response promoting blood clotting and vessel wall damage leading to heart disease and strokes*). This could partly explain the protective effect.

Regular alcohol consumption has an insulin-sensitizing effect on skeletal muscle that down-regulates insulin secretion. Since excess insulin promotes heart disease, this may further explain the protective effect. Women, who drink alcohol regularly and moderately, tend to have a decidedly lower body-mass index (*BMI*) than non-drinking women, despite slightly higher caloric intakes do. And we know that lower waist circumference is associated with a lower risk of breast cancer.

The consumption of red wine is associated with decreased cancer. But could this be explained by the demographic fact that people in this country who drink wine are richer and therefore receive better disease prevention and early detection? The cardiac protective effect is seen with all types of alcohol and all demographic groups.

Alcohol reduces the liver's production of sugar and thereby lowers blood sugars in patients with diabetes (and the rest of us as well). This is a good thing unless you are taking insulin or medications which increase insulin levels (*glipizide, glyburide, etc; see the diabetes chapter for details*).

What is this? A doctor who advocates drinking alcohol?! Do not drink if you have or have had a problem with alcohol or other drugs.

(d) ***Do not drink if you have or have had the problem with alcohol or other drugs***

Yes, alcohol is a drug. Drinking alcohol lowers your blood sugar and insulin levels by reducing gluconeogenesis (the liver production of sugar). Alcohol increases metabolic rate and thereby women who drink alcohol consume more calories but weigh less than women who do not drink. Consumption of moderate amounts of alcohol is associated with improved blood sugars in patients with diabetes. Is also associated with much less cardiac death in patients with diabetes and also less congestive heart failure (unless abused).

Yes, alcohol is a drug. It impairs judgement, lowers inhibitions, impairs your ability to drive an automobile and can damage your liver, heart, pancreas and brain with chronic excessive use. Drinking alcohol can lead to dependence and considerable social disruption including loss of your job, your marriage, your driver's license and may lead to death for you and others.

Alcohol is a two-edged sword. Ok, let's say you have diabetes or Syndrome X and you want the benefits of alcohol without the risks (or you just do not want to drink). What are your options? Another drug very similar to alcohol is metformin (Glucophage-Greek for consumes sugar). It is associated with a reduction in cardiac death, reduces the liver production of sugar, helps people lose weight and has been shown to delay the onset of diabetes when used in obese adolescents.

2 Moderation Management

But the protective effects are only seen with moderate drinking and disappear with excessive drinking. There is a group called Moderation Management that has put together some guidelines to help us make healthy decisions about drinking alcohol.

(a) ***Definition of Moderate Drinking:***

- Men: Up to 3-4/day for 3 or 4 days of the week with a maximum of fourteen drinks per week
- Women: Up to 2-3/day for 3 or 4 days of the week with a maximum of nine drinks per week
- By the way, these are limits and not targets.

(b) ***A Moderate Drinker:***

- Considers an occasional drink to be a small, though enjoyable, part of life
- Has hobbies, interests, and other ways to relax and enjoy life that do not involve alcohol
- Usually has friends who are moderate drinkers or nondrinkers
- Generally has something to eat before, during, or soon after drinking
- Usually does not drink for longer than an hour or two on any particular occasion
- Usually does not drink faster than one drink per half-hour
- Usually does not exceed the 0.055% blood alcohol content drinking limit
- Feels comfortable with his or her use of alcohol (*never drinks secretly and does not spend a lot of time thinking about drinking or planning to drink*)
- Never drives under the influence of alcohol

(c) ***Definition of a drink:***

- 5 oz. of wine (*no topping up please*)
- 1.5 oz. of whiskey/liquor
- 12 oz. regular beer
- 18 oz. of light beer.

But watch the carbohydrates in beer. Regular beer has 13-18 grams of carbohydrate; Sam Adams Light has 10 grams; Coors Light and Amstel Light each have 5 grams; Miller Lite has 3.2 grams; Michelob Ultra has 2.2 grams

(d) ***Alcoholics are often very spiritual people; they just have the wrong spirit.***

The Moderation Management group also recommends abstaining from drinking for 30 days to define your relationship with alcohol. If you have difficulty stopping drinking for that period, there could be more to your relationship with alcohol than meets the eye. Moderation Management is not an approach for someone who has been a dependent drinker in the past or who has significant withdrawal symptoms when they stop drinking. An example of this is what happened to the woman who first established Moderation Management. It turned out that she was a dependent drinker who several years later was convicted of vehicular manslaughter. An empty liquor bottle was found next to her following an auto accident in which two people died. She was not seriously injured. So do not drink if you feel you do not meet the definitions of a moderate drinker listed above.

(e) *There is Another Option*

Ok, you can't or don't want to drink alcohol. What are your options? Another drug very similar to alcohol is Glucophage (*Greek for eats sugar*) or the generic metformin. This is a medication for patients with diabetes, but it is also being used to delay or prevent the onset of diabetes. It works by reducing insulin resistance through the reduction of the liver production of glucose. It appears to reduce heart attacks and cardiac death as well as cancer of the pancreas. See Chapter 18 Making Your Diabetes Go Away (in Volume II) for more details and the references.

Near the End of Volume I;

Congratulations!

Epilogue

Congratulations! You have made it this far. The reason this book seems to end so abruptly is because we are not yet finished. Knowing what to eat is only half of the solution. Volume II will explore much more about why we develop diseases and how to not only stay healthy but also heal our bodies and minds. This will include a discussion of how fear and guilt adversely affect our health (as shown by their strong association with heart disease, cancer and early death). You will develop understanding and learn techniques to help overcome adverse emotions and improve outcomes.

The Critical Information Presented in this Book:

Eating sugar and starch is death (but a little death is ok?)

Eating nuts is associated with increased longevity.

Ketosis appears to slow aging (which is a good thing).
- It also helps maintain and build lean body mass.
- Studies in animals and people show that our bodies are actually more efficient and require less oxygen while exercising in ketosis.

Eating fatty fish and green leafy vegetables is hard to beat for a healthy meal.
- But avoid the farm-raised fish (not as good) and larger fish like tuna and swordfish (mercury).
- If you can eat sardines you are probably tough enough to make it over 100 years old (and still having sex).

Anger and depression kill (more about this in Volume II).
- So does excess alcohol consumption (but a little is actually good for you).

Limit your use of supplements; whole fresh food in a balanced diet is much better for you.
- But you just do not need the grains (unless you are crossing the damn desert!)

Milk makes more mucus in most of us
- (so if you have allergies avoid most dairy and citrus and sulfites in wine or wine vinegar).

The best predictor of disease and death is the circumference of your waist.
- So don't check your weight, check your waist.
- If you avoid sugar and the starchy carbohydrates, you will lose weight.
- If you continue to avoid them, you will keep the weight off.

Fat is good for you. But try to make it olive oil, omega-3 fish oils, nut oils.

Appendix One

NUTRITIONAL CONTENT OF FOODS IN THE MEDITERRANEAN HUNTER-GATHERER DIET

Vegetables, Nuts and Fruit

Nuts and Seeds	**Cal**	**Fat**	**Mono**	**O3/O6 Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Almonds, 30 nuts (1 oz)	180	16	11	0 / 4	1.5	7	4	7	0
Almond butter, 2 Tbs. (1 oz)	180	16	11	0 / 4	1.5	7	4	7	0
Brazil nuts, 8 medium (1 oz)	190	19	7	0 / 7	5	3	2	4	0
Cashews, 15 nuts (1 oz)	180	15	8	0 / 4	2.5	9	1	4	0
Cashew butter, 2 Tbs. (1 oz)	180	15	8	0 / 4	2.5	9	1	4	0
Flax seed, 3 Tbs. (1 oz)	140	10	2	6 / 2	1	11	8	5	0
Macadamia nuts, 16 nuts (1 oz)	220	20	11	0 / 4	5	3	2	3	0
Pecans, 14 halves (1 oz)	200	21	11	0 / 9	1	4	2	3	0
Pine nuts (1 oz)	190	18	5	0 / 11	2	6	2	8	0
Pistachios, 1 oz	180	16	3	0 / 11	2	8	2	6	0
Sunflower seeds, 1 oz	200	17	3	0 / 11	2	5	2	6	0
Walnuts, 14 halves (1 oz)	180	17	4	0 / 11	2	3	1.5	4	0
Mixed Nuts, 1 oz	180	16	8	0 / 6	2	7	3	5	0

Ground Nuts	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Peanuts, 35pcs (1 oz)	160	14	7	0 / 5	2	7	4	7	0
Peanut butter, 1Tbs. (1 oz)	160	14	7	0 / 5	2	7	4	7	0

Green Leafy Vegetables	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Arugula, 6 oz, 4 cups	50	0	0	0	0	8	4	6	0
Artichoke, 1 med.	60	0	0	0	0	8	6	6	0
Asparagus, 14 spears	60	0	0	0	0	12	6	6	0
Broccoli spears, 6 oz, 4 spears	50	0	0	0	0	8	4	6	0
Broccoli leaves, 6 oz, 1 cup	50	0	0	0	0	8	4	6	0
Brussel Sprouts, 6 oz, 12 med.	70	0	0	0	0	10	5	6	0
Cabbage (red), 3 oz, 1 cup	20	0	0	0	0	3	2	2	0
Cauliflower, 6 oz, 4 spears	50	0	0	0	0	8	4	6	0
Celery, 3 oz, 2 stalks	15	0	0	0	0	3	2	1	0
Collards, 3 oz, 1 cup	20	0	0	0	0	3	2	2	0
Dandelion greens, 1 cup	26	0	0	0	0	6	3	1	0
Endive, ½ whole	4	0	0	0	0	1		0	0
Kale, 3 oz, 1 cup	20	0	0	0	0	3	2	2	0
Leeks. 1/3 whole	20	0	0	0	0	3	2	2	0
Lettuce, red leaf , 4 cups, 6 oz	30	0	0	0	0	6	2	2	0
Scallions, 6 medium	15	1	0	0	0	3	1	0	0
Spinach, 6 oz, 4 cups	40	0	0	0	0	4	4	4	0
Turnip greens, 3 oz, 1 cup	30	0	0	0	0	3	2	2	0
Watercress, ½ cup	2	0	0	0	0	0	0	0	0

Vegetables, Nuts and Fruit

Fruit Vegetables	Cal	Fat	Mono	O3/O6 Poly	Sat	Carb	Fiber	Protein	Chol
Avocado, 1 medium	306	30	18	0/6	6	12	6	4	0
Cucumber, 1 medium	20	0	0	0	0	4	1	1	0
Eggplant, ¼ medium	11	0	0	0	0	3	1	0	0
Green beans, 1 cup	30	0	0	0	0	7	2	2	0
Olives, 6 olives	50	4	2	0 / 0	2	1	0	0	0
Okra, sliced 1 cup	36	0	0	0	0	8	3	3	0
Peas, ¾ cup	70	0	0	0	0	13	4	4	0
Peppers, sweet, 1 medium	18	0	0	0	0	4	1	1	0
Squash, summer, 1 cup	18	0	0	0	0	4	2	2	0
Tomato, 1 medium	20	0	0	0	0	8	2	2	0
Tomato, canned ½ cup	45	0	0	0	0	10	1	1	0
Water chestnuts, 4 oz can	25	0	0	0	0	5	1	1	0
Zucchini, 1 cup	18	0	0	0	0	4	2	2	0

Root Vegetables	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Carrot, 1 medium	30	0	0	0	0	5	2	1	0
Garlic, 1 clove pressed	4	0	0	0	0	1	1	0	0
Ginger, ¼ cup sliced	17	0	0	0	0	4	1	1	0
Onion, ½ cup chopped	32	0	0	0	0	7	2	1	0
Potato, 2"x5" baked	145	0	0	0	0	34	2	3	0
Sweet potato, 1 large	185	0	0	0	0	44	6	3	0

Miscellaneous Vegetables	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Mushrooms, 1 cup raw	24	0	0	0	0	4	1	2	0
Pepper rings, hot, 12 rings	5	0	0	0	0	1	0	0	0
Mustard- Stone ground, 1 Tsp.	14	1	0	0	0	1	0	1	0

Oils	Cal	Fat	Mono	O3/O6 Poly	Sat	Carb	Fiber	Protein	Chol
Canola oil, 1 Tbs.	130	14	8	2 / 3	1	0	0	0	0
Flax oil, 1 Tbs.	130	14	3	8 / 2	0	0	0	0	0
Olive oil, 1 Tbs.	130	14	10	0 / 2	2	0	0	0	0

Salad Dressings	Cal	Fat	Mono	O3/O6 Poly	Sat	Carb	Fiber	Protein	Chol
Olive oil/vinegar, 2 Tbs.	140	14	10	0 / 2	2	2	0	0	0
Flax oil/vinegar, 2 Tbs.	140	14	3	8 / 2	0	2	0	0	0
Canola oil mayonnaise, 1 Tbs.	100	11	6	0 / 3	1	0	0	0	5
"Real" mayonnaise, 1 Tbs .	100	11	3	0 / 7	1.5	0	0	0	5

Vegetables, Nuts and Fruit

Green Salads	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Green Salad, 6 oz, 4 cups	40	0	0	0	0	4	4	4	0
Olive Salad, 6 olives	50	4	2	0 / 0	2	1	0	0	0

Dips	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Almond butter, 1 Tbs.	180	16	11	0 / 4	1.5	7	4	7	0
Babaganoush, 2 Tbs.	50	3.5	1	0 / 2	0.5	5	1	2	0
Bean dip, 2 Tbs.	35	1	0	0	1	5	1	2	0
Cocktail sauce, ¼ cup	100	0	0	0	0	23	1	1	0
Guacamole, 2 Tbs.	30	3	2	0 / 1	0	2	0	0	0
Humus, 2 Tbs.	50	3.5	1	0 / 2	0.5	5	1	2	0

Fruits, fresh	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Apple, 1 small	81	0	0	0	0	21		0	0
Apricot, 3 medium	55	0	0	0	0	14	3	1	0
Banana, 1 medium, ripe	101	0	0	0	0	26	3	1	0
Blackberries, ½ cup	42	0	0	0	0	10	3	1	0
Blueberry, ½ cup	40	0	0	0	0	10	3	1	0
Cantaloupe, 1 cup cubed	48	0	0	0	0	12	0	1	0
Clementine/Tangerine, 1 medium	39	0	0	0	0	10	2	1	0
Grapefruit, ½ medium	43	0	0	0	0	11	1	1	0
Kiwi, 1 medium	46	0	0	0	0	11	3	1	0
Orange, 3” in diameter	90	0	0	0	0	20	3	2	0
Peach, 1 large	65	0	0	0	0	17	3	1	0
Pear, 1 medium	98	1	0	0	0	25	4	1	0
Pineapple, ½ cup fresh	41	0	0	0	0	11	0	1	0
Raspberries, ½ cup	35	0	0	0	0	9	4	1	0
Rhubarb, diced ½ cup	10	0	0	0	0	2	1	0	0
Strawberries, 1 cup halves	50	0	0	0	0	11	4	1	0

Fruits, dried	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Apricot, 3 medium	55	0	0	0	0	14	3	1	0
Figs, dried, 3 medium	90	0	0	0	0	23	3	1	0
Prunes, 3 medium	60	0	0	0	0	15	1	0	0
Raisins, ¼ cup packed	125	1	0	0	0	32	2	2	0

Fish, Poultry and Meats

Seafood	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Anchovies, 6 fillets	25	1.5	0	1 / 0	0	0	0	3	
Crabmeat (canned), 2 oz	45	1	0	1 / 0	0	0	0	8	50
Flounder, 6 oz	150	2	0	1 / 1	0	0	0	33	75
Haddock, 4 oz	99	1	0	1 / 0	0	0	0	21	65
Herring, kippered 3 oz	165	12	0	9 / 2	1	0	0	11	50
Mussels, 4 oz	98	3	0	2 / 1	0	4	0	14	32
Salmon, 4 oz	180	11	0	6 / 2	3	0	0	22	62
Salmon (smoked), 2 oz	130	9	0	5 / 1	2	0	0	11	30
Sardines, 3 oz, 1 can, olive oil	156	10	0	5 / 1	4	0	0	14	48
Scallops, 4 oz, ¾ cup	127	4	1	2 / 0	1	8	0	16	85
Shrimp, 4 oz	120	2	0	1 / 0	0	1	0	23	173
Tuna, 3 oz	105	2	0	2 / 0	0	0	0	22	37
Whitefish, 4 oz	153	7	0	3 / 2	1	0	0	22	68

Eggs	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Eggs, 2 large	140	9	3	1 / 2	3	1	0	12	426
Egg whites from 2 large eggs	60	0	0	0	0	2	0	12	0

Poultry	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Chicken breast									
-Skinless/boneless, 6 oz	190	4	0	0 / 2	2	0	0	37	120
-With skin and bone	270	18	4	0 / 4	10	1	0	32	120
Chicken thigh/leg/wing, 6 oz	375	30	8	0 / 4	18	0	0	25	150
Cornish game hen, 4 oz	270	18	4	0 / 4	2	0	0	30	170
Turkey breast, 6 oz	210	5	0	0 / 3	2	0	0	46	100
Turkey leg/thigh, 6 oz	310	17	4	0 / 3	10	0	0	44	138
Turkey bacon, ½ oz, 2 slices	42	2	0	0	1	0	0	6	20
Turkey sausage, Italian 4 oz	160	9	2	0 / 2	5	1	0	26	70

Beef/Pork/Lamb/Bison	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Bacon-Canadian, 3 slices	70	3	1	0	2	0	0	11	30
Bacon, 2 strips	60	5	2	0	3	0	0	4	10
Beef -Filet Mignon, 6 oz	278	20	11	0 / 1	8	0	0	48	130
Beef -Lean Ground, 6 oz	460	32	19	0 / 1	12	0	0	42	110
Beef -Roast, 6 oz	278	20	11	0 / 1	8	0	0	48	125
Beef -Sirloin, 6 oz	344	14	7	0 / 1	6	0	0	52	150
Beef –Tenderloin, 6 oz	278	20	11	0 / 1	8	0	0	48	135
Bison steak, 6 oz	210	4	0	1 / 1	2	0	0	48	120
Frankfurter, beef 1 link	142	13	6	0 / 1	6	1	0	5	27
Ham, cured w/out nitrites 6 oz	230	10	5	0 / 1	4	0	0	33	90
Lamb -Leg of, 6 oz	340	17	9	0 / 1	7	0	0	46	150
Lamb -Tenderloin, 6 oz	344	16	8	0 / 1	7	0	0	46	155
Pork -Tenderloin, 6 oz	392	18	9	0 / 1	8	0	0	54	135

Drinks and Snacks

Cocktail Hour	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Spirits 90 proof (1.5 oz)	105	0	0	0	0	0	0	0	0
Wine-dry 5 oz	85	0	0	0	0	3	0	0	0
Beer, Sam Adams equivalent 12 oz	146	0	0	0	0	13	1	1	0
Light beer									
-Sam Adams Light, 12 oz	99	0	0	0	0	10	1	1	0
-Miller High Life Light, 12 oz	99	0	0	0	0	7	0	1	0
-Coors and Amstel Light, 12 oz	99	0	0	0	0	5	0	1	0
-Miller Light, 12 oz	96	0	0	0	0	3	0	1	0
-Michelob Ultra, 12 oz	99	0	0	0	0	2	0	1	0

Beverages	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Cocoa, unsweetened, 1 Tbs.	20	1	0	0	1	3	1	1	0
Coffee, unsweetened brewed	4	0	0	0	0	1	0	0	0
Tea, unsweetened brewed	2	0	0	0	0	1	0	0	0
Colas and other sodas, 16 oz	201	0	0	0	0	51	0	0	0
Juices									
-Apple, 8 oz	116	0	0	0	0	29	0	0	0
-Cranberry, 2 oz unsweetened and diluted to 8 oz	54	0	0	0	0	14	0	0	0
-Grapefruit, 8 oz	94	0	0	0	0	22	0	0	0
-Orange, 8 oz	112	0	0	0	0	26	0	0	0
-V-8 Low Sodium, 8 oz	60	0	0	0	0	11	2	0	0
Soy milk- plain, 8 oz	130	4	1	0 / 1	1	13	0	10	0

Diet Breakfast Drinks	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Carnation Instant Breakfast, 1 can	210	3	0	0	0	34	1	12	10
Slim Fast, 1 can	220	2	0	0	0	48	5	7	10
Ensure Plus, 1 can	360	13	6	0 / 6	1	47	0	13	5

Candies and Snack Bars	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Chocolate, unsweetened, 1 oz	140	14	3	0 / 2	9	4	2	4	0
Chocolate, 70% unsweetened, 1 oz	136	10	2	0 / 2	6	12	2	3	0
Hershey's milk chocolate, 1.5 oz	200	12	3	0 / 2	7	21	1	3	10
Reese's peanut butter cup, 1.5 oz	250	14	4	0 / 2	8	25	1	5	5
Twix, 1 oz	140	7	3	0 / 1	4	19	0	1	0
Slim Fast Chewy Caramel	120	4	1	0 / 1	2	22	2	1	5
Granola bars	140	0	0	0	0	30	2	2	0
Power Bar, 1 bar	230	3	1	0 / 1	1	45	3	10	0
Pure Protein –Peanut butter, 1 bar	280	7	2	0 / 1	4	9	0	33	5

Sweeteners	**Cal**	**Fat**	**Mono**	**Poly**	**Sat**	**Carb**	**Fiber**	**Protein**	**Chol**
Stevia, 1 pack (sweet herb)	5	0	0	0	0	1	0	0	0
Sugar, 1 Tsp.	20	0	0	0	0	5	0	0	0
Molasses, blackstrap 1 Tbs.	42	0	0	0	0	11	0	0	0
Syrup, corn or Maple 1 Tbs.	61	0	0	0	0	16	0	0	0

Dairy

Dairy	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Butter, 1 Tbs.	102	12	4	0 / 0	8	0	0	0	31
Cheeses									
-Brie, 1 oz	94	8	3	0 / 0	5	0	0	6	28
-Cheddar, 1 oz	113	9	3	0 / 0	6	0	0	7	30
-Cream, 1 oz	98	10	4	0 / 0	6	1	0	2	30
-Goat, 1 oz	103	9	4	0 / 0	5	1	0	6	22
-Mozzarella, part skim 1 oz	79	6	2	0 / 0	4	1	0	5	15
-Muenster, 1 oz	103	8	3	0 / 0	5	0	0	7	27
-Swiss, 1 oz	105	8	3	0 / 0	5	0	0	8	25
Cottage cheese 1%, 1 oz	100	2	1	0 / 0	1	4	0	14	15
Creams									
-Heavy, 1 Tbs.	53	6	2	0 / 0	4	0	0	0	21
-Sour, 2 Tbs.	60	5	1	0 / 0	4	1	0	1	25
Milk, skim, 8 oz	80	0	0	0	0	12	0	8	3
Milk, whole, 8 oz	150	8	3	0 / 0	5	12	0	8	35
Yogurt (whole milk), 8 oz	150	8	2	0 / 0	5	11	0	9	31

Grain-Based Foods

Grain-Based Foods	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Bagel, 1 whole	190	1	0	1	0	41	12	6	0
Breads									
-12 Grain (Arnold), 2 slices	120	0	0	0	0	20	2	4	0
-Pita, ½ large	82	0	0	0	0	17	1	3	0
-Sourdough (Arnold), 2 slices	180	1	0	0	0	38	2	4	0
-Weightwatchers Multigrain, 2 sl.	82	2	0	0 / 1	0	14	4	4	0
-Wonderbread, 2 slices	110	1	0	0	0	20	1	30	
Crackers, wheat 6 pieces	140	6	0	0 / 5	1	19	1	2	0
Donut, glazed	170	10	0	0 / 8	2	19	0	2	0
Pancakes, 3 medium	200	3	1	0 / 1	1	40	2	6	15
Pasta noodles, 1 cup cooked	197	1	0	0	0	40	2	7	0
Pastry, Entenmann's Fat free, 1 bun	150	0	0	0	0	36	1	3	0

Grains and Beans	Cal	Fat	Mono	Poly	Sat	Carb	Fiber	Protein	Chol
Barley, ½ cup cooked	97	0	0	0	0	22	4	2	0
Beans,									
-Black, ½ cup cooked	114	0	0	0	0	20	7	8	0
-Chickpeas, ½ cup cooked	100	2	0	0	0	20	7	6	0
-Kidney, ½ cup cooked	112	0	0	0	0	20	7	8	0
-Lentil, ½ cup cooked	115	0	0	0	0	20	7	9	0
-Navy, ½ cup cooked	129	1	0	0	0	24	9	8	0
-Pinto, ½ cup cooked	116	0	0	0	0	22	8	7	0
Black-eyed peas, ½ cup cooked	90	0	0	0	0	19	5	7	0
Oats, rolled, ¼ cup	150	3	0	0 / 1	2	27	4	5	0
Rice, brown, ½ cooked	110	1	0	0/0	0	23	1	2	0
Rice cake, 1 plain	35	0	0	0	0	7	0	1	0
Soybeans, roasted, ¼ cup	202	11	0	0/9	2	29	2	15	0

Index

The Best Way to Stay Healthy

Stay As Far Away From Doctors As You Can!

Volume 2:

Healing Body, Mind and Spirit

George Steele MD

VOLUME 2

HEALING BODY, MIND AND SPIRIT

Part 1: Healing

Part 2: When You Need to See Your Doctor

Part 1

Healing

Women are often surprised by the amount of anger expressed in this book. Men do not mention the anger as much. Could this imply that women are having more of their basic instincts met, while society has suppressed men's true expression of self? Are women meant to create nurturing environments within their communities and therefore find meaning in their families and children? Are men destined to wander in the wilderness (or the golf course) poking their sticks or spears at prey, and therefore feel frustrated and trapped by their current existence? Or perhaps women are just more accepting of their situations than men are?

We all have anger. Included in this book are tools for both men and women to begin to recognize, accept and move past our anger. Men have reasons to be angry. Women also have many reasons to be disappointed, frustrated and angry.

Much of the book is written in the voice of a man. My hope is that men will recognize some of themselves in the stories and that women will recognize how truly disconnected from reality we men really are (and therefore have mercy on us).

I am a person who jokes and smiles a lot, although at times I still feel and express anger. Joann, my mother-in-law, insists I have a great life with a wonderful wife and wonderful children and should be content. Yes, I admit she is correct, yet at times I still struggle. I believe we will all struggle with anger if we are honest with ourselves and those around us. But I also believe we can move beyond that anger and thereby love each other and ourselves as we are meant to do.

Fear and Guilt are the 8th and 9th Deadly Sins

Where is the love in that?

Jack

1

HEALING

1 Healing Comes From Within

Sometimes our bodies speak to us about our approach to life. When my patients have neck pain, back pain, stomach pain, knee pain, shoulder pain, or headache, after the medical evaluation reveals no abnormalities I suggest, *Could this be from anger, resentment or bitterness?* Many patients admit this could be true. I have found over the years that many of our physical symptoms come from anger, fear or guilt. Our experience of pain is one way our bodies deliver this message to us.

Treating pain symptoms, however, is different from alleviating illness and suffering. If our bodies are speaking to us, then we need to listen to what they might be suggesting to us. This can include neck and upper back pain, chest pain and anxiety. Do I believe anger and hostility can create heart disease? Yes! Do I believe anxiety and depression affect our immune system? Yes! These symptoms come long before the disease, so there is ample time to change course if we recognize the risks of continuing to be and act in unhealthy ways.

In a recent study a cold virus was placed in the noses of people with different scores on an anxiety scale. Fully half the high-stress people but only twenty-percent of the low-stress people became ill. Clearly, the experience of distress manifests itself in our bodies as illness.

(a) *Neck and Upper Back Spasms Triggered by Anger*

A young married woman in her mid-thirties visited me complaining of terrible neck and upper back spasms with no injury she could recall. She just woke up with it. Her exam showed very tight muscles with knots across her neck and upper back. Her strength and sensation were intact. As I was examining her, we began chatting about life. She was staying home with her two young children while her husband worked. He plays golf on the weekends. She had liked the career she had before they had children and wished she could return to work, but her husband wanted to keep her at home with the kids. In fact, they had a big fight the evening before.

I had initially joked with her as I felt her tight shoulder muscles *Do you know where this spasm comes from? Anger, resentment, and bitterness.* We had laughed at the time, but now it was becoming clear she had a great deal of anger. She was not caring for herself in her anger with her husband (and herself?); she was eating unhealthy foods and not exercising. She was gaining weight and becoming depressed.

I had awakened the idea that her neck and upper back spasms were a manifestation of her anger with her husband. The opportunity for healing arises when this young woman recognizes that her body is screaming at her to change her approach to life. I know that if she does not make changes in her life, her body will most likely continue to increase the pressure. She may experience fatigue, depression, body aches and pain including back pain, more neck and upper back pain, headaches, stomach pain, chest pain until she finally makes the changes she requires to become healthy again.

All healing begins with a transformation of thoughts. This young woman must change her approach to life. She must take responsibility for her own happiness. She must ask for (even demand) what she requires to continue to live and grow and participate in her family. When this realization sinks in, her mind will no longer have to send the messages to her muscles causing her to experience the pain of neck and upper back spasms.

Still, how can she do this? Where does she start? The marriage counselor? The therapist? The personal trainer? Her physician? We all need some guidance at times and any one of these persons can be appropriate, although the first two have extensive training in facilitating understanding and healing.

Is fear the origin of her anger? If so, what is this young woman afraid of? Her husband? What is it about her husband? Why does she perceive him as controlling? She can do anything she wants; she seems self-motivated. Some improved skills of negotiation and the strength to look within are required so that she can determine what it is she wants.

(b) ***Where is the Love in That?***

Jack, one of my Sunday school students, answered *Where is the love in that?* to almost any question that I asked. At first his answer caught me off-guard, but then I enjoyed his humor and saw the truth in what he said. Soon I stole his answer and used it when he asked a question. He retorted *Hey that's my line!*

Returning to my patient with the neck and upper back spasms, should I ask this young woman to examine her life? Can I tell her to answer the question *Where is the love in that?* Can I tell her that the battle going on in her mind about her husband is resulting in a physical disorder that is affecting her muscles, nerves, tendons and ligaments? As her physician, can I advise her to start examining what she truly values in her life, particularly the values she and her husband share?

These values might include the following:

- Her desire to experience and contribute to life's activities through work outside the home (Is her resentment about not having a career impairing her ability to care for their children?).
- Meaningful work (preferably with pay).
- The happiness and success of family.
- Her sense of belonging and friendship with friends and co-workers.
- A sense of closeness and intimacy with her husband and family.
- A sense of self-worth.

I reminded her how meaning (something beyond themselves) carried many people through the Holocaust. Living for others rather than themselves, these individuals took care of themselves so that they could offer their love to others for whom they cared. I did not tell her that the neck and upper back spasms were all in her head. I told her she did not have to have that intensity level of neck and upper back pain. Her repressed anger was triggering the muscle spasms in her neck and upper back.

How does this young woman (and the rest of us) learn to ask for and receive what she desires?

2 Learning How to Get What We Desire

The difference between some patients who experience healing and others who do not is that some people know how to get what they want in life. When we get what we require to be happy, like the young woman with neck and upper back spasms, we will heal faster, more completely, and with far fewer medical interventions.

(a) *Accepting Ourselves*

To learn to get what we desire in life, we must first value who we truly are, since our capacity for healing depends on our understanding of who we are and who we can become. Most of us require for healing:

- Satisfying relationships with family members, friends and co-workers who share our values.
- Meaningful work.
- Personal space and time to replenish the self, be it through exercise, meditation, yoga and other self-healing techniques, hiking, camping, sports or gardening.

Yes, we need these values in our lives for the sake of our families – but first, we owe it to ourselves. We will explore how we can do this.

(b) *Moving Beyond Our Care-Giver Roles*

Self-sacrifice eventually catches up with most of us when we suddenly find ourselves in the caregiver role. We are the supportive one in marriage – our spouse's career – our life. We are the encouraging parents of our children – their school, sports, extracurricular activities – our life. We are the faithful friend and dependable co-worker and the list goes on and on. Suddenly and unexpectedly, like the woman who just woke up one day with her neck and upper back spasms, we wake up and find ourselves being directed into an inwardly focused assessment of our life and its meaning.

More often than not, this inward assessment of our lives is the result of pain, illness or disease. It is almost as if we make ourselves ill by having thoughts of self-hatred and resentment for having given our lives away.

But how do we get past the anger?
No one has taken our life away!
We have given our life away!

3 Understanding Our Fears

Is fear the origin of our anger? If so, what is it we are afraid of? Do we fear our marriage partner, our family members, or our co-workers? If so, why is it that we fear them? Are we angry, resentful and bitter that our wishes are not being met and our values respected? Do we even know what it is we want?

What causes us to choose?

- To refrain from making decisions so we do not have the responsibility of making a mistake and thereby affecting someone else's life?
- To avoid conflict by not even looking seriously at our own wishes and values but only reacting to those around us?
- To be the victim, to follow someone else's choices and plans rather than making plans of our own?
- To punish ourselves for past sins of not being good enough?

The Reverend Lewis Mills, an Episcopal priest, patient and friend, always said:

You are good enough!
Let go of past sins and indiscretions.
Add something to the world and your community:
Yourself!
In all your glory and foibles.

Every day we must do our best to follow this advice. What we add to the world and our community, the blessing our presence gives to others, will heal our fears.

4 Why Do We Give Away Our Lives?

I have found that we give away our lives to:

- Avoid responsibility for the decisions in our life
- Prevent conflict in relationships
- Take on the role of victim
- Punish someone else (*passive aggressive*)
- Express criticism of ourselves (*psychic masochism*)

So, if we know why we give away our lives, then what do we do? Rachel Naomi Remen, M.D. provides an interesting perspective to our question of why we give away our lives with an interesting analogy. Dr. Remen explains in her book, Kitchen Table Wisdom: Stories That Heal:

> Our lives are a lot like being a gardener
> Seeing that the weeds are too big
> Rather than that the flowers need to grow bigger.

Oblivious to the consequences of ignoring our desires, we give away our lives when we focus on the experience of the negative rather than the positive.

Returning to Dr. Remen's analogy, simply trying to fix the weeds will not help us; rather, planting flowers (our positive thought patterns) is a better way to achieve beauty. Skeptics will wonder whether it is possible to have flowers without weeds. Their point is valid, but I recommend that we nurture the good (the flowers) and neglect the bad (the weeds). In time, the flowers will grow and the weeds die. Think about it for a while, for:

> We are like a garden full of a myriad of plants.
> Some of which are good (the flowers).
> Others of which are not so good (the weeds).
> We can choose which plants to water and tend.
> And which to ignore.
>
> Think of the best things in your life.
> Think of the worst.
> Water the best.
> Ignore the worst.
> The best will grow and overshadow the rest.

5 How Do We Take Back Our Lives?

Just as the gardener is responsible for the garden, we are responsible for our own happiness and health. The only way we can take back our lives is by taking responsibility and working for those things that have value in our lives. Our choices include:

- Our marriage partner
- Family members
- Work and professional life

So stop making excuses that someone else or something outside of yourself is stopping you from the experience of happiness. We can only do that ourselves. We are the only one who can prevent our self from working toward the goals that we value. And we are the only one who can move toward those goals. If we are willing, then we can definitely create the type of life we want. All of this is so well stated by the poet, Marianne Williamson in her poem. Nelson Mandela read this poem during his inauguration to be president of South Africa.

> Our deepest fear is not that we are inadequate.
> Our deepest fear is that we are powerful beyond measure.
> It is our light not our darkness that most frightens us.
> We ask ourselves, who am I to be brilliant, gorgeous, talented and fabulous?
> Actually, who are you not to be?
>
> You are a child of God.
> Your playing small doesn't serve the world.
> There's nothing enlightened about shrinking so that other people won't feel insecure around you.
> We were born to make manifest the glory of God that is within us.
> It's not just in some of us; it's in everyone.
>
> And as we let our own light shine, we unconsciously give other people permission to do the same.
> As we are liberated from our own fear, our presence automatically liberates others.
>
> Marianne Williamson

(a) *A Simple Exercise*

Now, I ask you to apply a technique to clarify your values. Write down what has the most value in your life, that which you cannot live without. Living with your children? Being creative in your career? Money and prosperity? The experience of love and intimacy?

Now what are you willing to put up with to accomplish that? A lot, right!

Once we understand our values and learn to live in harmony with our wishes and desires, well being, good health, and fulfilling relationships can be achieved.

(b) ***Achieving Success***

So, forget the injustices of life and work toward experiencing positive thoughts. You may even start with a bird feeder. One morning our son came in while I was in the shower to tell me a Mourning dove and a squirrel, within inches of each other, were eating the birdseed we had put out under the bird feeder. He was surprised the squirrel did not attack the Mourning dove. I suggested the bird and the squirrel had learned there is enough birdseed to share.

We do not have to grab as much as we can and worry that someone else is getting some of our stuff. We don't have to regard life as a process that requires hard work and luck, often at the expense of others. If we share, there is enough for everyone. Success does not come only from hard work, exacting plans and driving ambition. So share a meal with a friend today (including a squirrel?).

6 Determining What We Desire and Value

Getting back to what we desire and value, healing does not occur only on an individual level. Each of us is connected through a vast network of relationships to innumerable other people, so the process of healing even one person has far-reaching effects.

Talk to anyone with whom you might partner in your journey of healing – your marriage partner, a family member, or a special friend – about what you desire and has value and meaning for you. Talk about your individual desires and how best to preserve that which has value for each of you. It may require some sacrifice. Each of you may have to look at life *(*and each other) somewhat differently, from a new angle or a new point of view.

Life partners must learn to support each other in this and be willing to have open minds about what is acceptable and what is required from each of them, both individually and in their relationship. The relationship is the most important. Rachel Naomi Remen, M.D., states that:

> Two people in a healing relationship are both peers, both wounded and both with healing capacity.... I don't believe that one person heals another, I believe that what we do is invite the other person into a healing relationship.

The hard decision comes when life partners (and marriage partners) find they cannot work to similar ends. I believe they owe it to each other to talk things out. If talking fails for whatever reason (and repeated attempts are appropriate and have been done by many of us, successfully so far), then more meaning and value may be found elsewhere for each of them. But only as the last

resort. Just remember that no matter where you have come from or how challenging your life has been, you can change your life for the better.

(a) ***We Are Already Whole!***

Joan Borysenko, Ph.D., former director of the Mind/Body Clinic at New England Deaconess Hospital, Harvard Medical School and author of Minding the Body, Mending the Mind observes that:

> The message that underlies healing is simple yet radical: We are already whole. The work of healing is peeling away the barriers of fear that keep us unaware of our true nature. Healing is the rediscovery of who we are and who we have always been.

Our healing and potential for happiness in life is determined by how much we value who we truly are. Even if our strong self-acceptance threatens other people, we must continue the course because our self-acceptance and capacity for healing depend on each other.

(b) ***Give and Let Go***

We often spend our lives running after (*or away from*) people and relationships, distracted from the life within us. Again, as the famous song goes, we are *Lookin' for luv in all the wrong places*, when it is already inside of us.

I would be happy if only…
I could be with that person.
I could get that job.
I were better looking, more successful, richer, sexier...

Let go of these negative wishes and emotions. Let go of these emotional barriers because you may find yourself in hell or the *Twilight Zone*.

Listen and allow your inner voice to speak without fear. Remember that we create the disharmony that results in our fears; we choose pain and illness over health. Our true happiness comes from within.

The Chinese fortune is right:
You will receive what you wish for the most.
(So watch what you wish for!)

7 Escaping From Our Pain

Although we are born with certain genetic predisposition toward mental and physical characteristics, we are not doomed to suffer from pre-determined illness or disease. While some pain is inevitable in each of our lives, if we fail to pay attention to our little pains and the messages our pain is trying to deliver to us, our little pains will eventually manifest themselves as progressively serious illness.

(a) *Back Pain*

Approximately eight in ten Americans have a history of back pain. This was not true in the not-so-distant past. Why have our backs become so unfit and compromised? Why does it seem that so many of my successful and motivated patients are prone to back injury? And why has the medical profession (I include myself) suddenly become so helpless in dealing with back pain?

As I begin to answer my questions regarding our back pain epidemic, I am reminded of a patient I saw when I first started working at the University of Pennsylvania Health System. This patient brought me the book Healing Back Pain: The Mind-Body Connection by John E. Sarno MD. Dr. Sarno is a professor of Clinical Rehabilitation Medicine at the New York University School of Medicine (he is also Howard Stern's back doctor, but don't hold that against him). This patient had been diagnosed with chronic sciatica for fifteen years until a friend gave him this book. Now his pain was gone.

Since then, I have read Dr. Sarno's second book, The Mind-Body Prescription: Healing the Body, Healing the Pain, published after Dr. Sarno created a controversy in 1990 when he suggested that much of our back pain comes from our negative attitudes (especially rage). Two of my patients have been through Dr. Sarno's program at the New York University Medical Center. Both patients had been told by other physicians to have back surgery. Both patients were pain-free by the end of a day of consultation with Dr. Sarno.

Clearly, after identifying stress in their back pain, these patients went on to heal themselves without pain-killing drugs or dangerous back surgery. Each of these patients with back pain successfully learned to overcome their emotional barriers by:

- Learning to listen to their little pains as the body giving us messages.
- Letting others know what they desire in life.
- And more –

(b) *Acceptance*

So what more did my three patients with back pain do before they were able to heal themselves? The only prerequisite, established by Dr. Sarno, was that they had to realize that their mind could affect their body! While this may seem radical, this belief was common earlier in the

twentieth century, when psychoanalysis was at its peak of popularity. Today, this belief in the mind-body connection promises to become more accepted in our current era of alternative medical therapies and anger management.

Our minds can cause our neck and upper back spasms (seems obvious since they are connected by nerves). Dr. Sarno explains that what is causing this back pain is rage. Not just anger but rage. But we say we are not angry. As you read what Dr. Sarno and I have independently written, you realize you might be a little angry. Then you feel that, *Well, I have a right to be angry*. Then finally, *Damn right, I am angry!*

Anger leads to aggression that results in rage directed at others and us. Now, how do we get rid of this anger? Read on –

(c) ***Anger, Fear and Choices***

The origin of our anger is fear. We fear the loss of the most important areas of our life:

Loss of control in love, relationships and sexuality.
Loss of power in career and creativity.
Loss of security in money and spirituality (our physical and spiritual desires).

Fear is a strong negative emotion caused by our anticipation or awareness that at any time, we may lose one or more of the most important areas of our life. So, what choice do we have? Each choice we make could have positive or negative impacts on important areas of our life.

Choices based on fear will often result in anger toward the people or situation that prompted our fear. Yet, we make many choices based on fear of loss of control, power and security such as choices based on our fear of losing our house and mortgage, our job, our family's security.

We also make choices based on what we should do. We *should* on ourselves. We must stop *should-ing* on ourselves and instead ask *What do I want to do? What are my values in life?*

(d) ***Chronic Pains Due To Suppressed Anger***

An example of the consequences of positive/negative choice is one of my patients in his early thirties. He and his new wife had chosen to relocate from the Connecticut coast to suburban Philadelphia (with his boat). At the same time they were blessed with their first child, a mortgage, a new job he was frustrated in, and no friends. His life as he had known it was over. By the time he presented himself to my office, he had developed neck pain, followed by upper back pain, then elbow pain and finally numbness in his little finger and upper arm weakness in the pattern of a pinched nerve in the neck. A neurologist had looked at his x-rays and said he had developed degenerative disk disease in his cervical spine. My patient believed the neurologist. He faithfully wore a soft cervical collar. Only after I examined him and found that while an injury may have

triggered the pain he was experiencing, his injury was not the cause of the amount or intensity of the resulting pain.

Based on the success of other patients, two of whom had seen Dr. Sarno, I asked this patient whether he was upset with the choices he had recently made in his life. Was he upset at his sudden loss of freedom and therefore angry? Once I helped this patient address the cause of his anger, his pain improved. Keep reading for more options for escape from pain.

8 Distress and Other Stress Factors

What is amazing is our bodies may actually be able to tell us what is wrong and, therefore, direct us how to heal ourselves. Our illnesses can reflect where our stresses are, and what we need to focus on to heal. Understanding how we respond to distress also helps.

(a) *Molecular and Hormonal Changes*

Almost every cell in our body can alter our experience of emotions (how we feel).

Even the white blood cells that fight infection release chemicals (neuropeptides) that change how we feel.

I think this is incredible! Our emotions are a reflection of the state of our body, and our bodies reflect our emotions in both a positive (healthy) way, and a negative (unhealthy) way. One idea that emerges from this view of the mind-body is that our life is like a jigsaw puzzle, with lessons to be learned from each light and dark fragment of the puzzle.

So which comes first, our pain, illness or our experience of anger and fear? Can you see where this is going? In order to feel great and *Stay Healthy*, our whole body must participate and contribute positive factors.

Our hormonal state, and therefore how we are feeling, reflects the state of health of our bodies. The unanswered question is whether hormones are released in response to our sense of healing? There is increasing evidence this may be so. Regardless, these examples serve to remind us that the things in life we cannot measure may be the things that ultimately will keep us healthy.

9 Anger, Aggression and Rage

Let us assume for a moment that Dr. Sarno's hypothesis is right and that rage underlies much of our neck and upper back pain. But rage against what? Ourselves? Not standing up for ourselves? How do we eliminate our rage? Understanding that our pain is related to bitterness and resentment is helpful but different from getting our pain to go away.

People talk about meditation, yoga, Pilates and massage. All of these, however, are only scratching the surface. We need something to successfully get at the root of the problem. This is not so much a physical problem as an emotional one (although most of us do have some degenerative disk disease or arthritis in our necks, upper backs and elsewhere). The fact is, our anger, resentment, bitterness, and yes, the experience of rage intensify most of our physical problems.

- Our blood pressure goes up when we are angry and upset about something.
- Our stomach hurts when we struggle with our parents, our boss or our spouse.
- Our back hurts when we are hostile or dejected.
- Our diabetes and cholesterol are worse when we have fear or grief.
- Food sticks in our lower esophagus when people ignore our expression of self.
- We eat and drink too much when we try to avoid or suppress our feelings.
- Our mood is worse when we are not following our dream (whatever that is!).

So why don't we simply let it all go? If we do meditations at home and work, will our blood pressure drop twenty points? Sure, we can get into a chronic meditative state in which we are one with ourselves and everything is better, for the moment. But then we cannot accomplish anything else (like our jobs)! Not to mention this prevents meaningful interaction with others. Most of us cannot afford to vegetate or escape for too long. We must live in the real world.

Hence how do we reduce our emotional conflicts and reduce our blood pressure at the same time? How do we convince ourselves that our pain and illness are rooted in our thoughts so that healing can begin? How can we divert our focus on the pain and negative emotions and begin focusing our attention on more positive thoughts? Are our pain and illness a needed diversion from our emotional conflicts? Do we need our pain and illness? Is our physical healing inseparable from our emotional healing?

10 Why Do We Experience Distress?

When we think about why we experience anger and rage we discover that we must approach our emotional conflicts in a more effective manner. We do not always have to get jealous, grasp for things, be anxious and sad and desperate and greedy and react to whatever provokes us. Instead we can understand the origins of our emotional conflicts, understand why our distress seems to rise spontaneously, and thereby begin to move toward healing.

(a) *Trying to Be Something We Are Not*

I believe one of the primary causes of much of our distress is trying to be something we are not. We put ourselves in extreme anxiety trying to:

- Be nice when we are really mad.
- Feel happy when we are sad.
- Work too hard when we are completely worn-out.
- Act like we are relaxed when we are totally stressed.
- Deny our sexuality when our bodies tell us otherwise.

When we make ourselves something that we are not, we often blame the outside world for our subsequent state of emotional conflict. We must stop trying to be what we are not, stop believing what we do not feel.

(1) Let Go of Blame

To stop our distress, we must take responsibility for our lives and let go of blame. If we do not take control of our total health, emotional conflict will continue in our mind and bodies. Over time, our distress will intensify as a result of our minds being perfectly trained by and for conflict.

To stop this training and the self-perpetuating cycle of distress, we must train ourselves to let go of the blame. We must learn that when we try to blame someone else (*They make me so mad!*); if the truth is told, they do not make us angry. Our habitual response to their actions is anger. This common sense attitude, however, is not enough.

(2) Our Dishonest Selves

We must also learn how to break our harmful habits. We cannot say we are not angry, when we are really angry. We cannot say they do not make us angry, because they really do. Great! But, as a skeptic might ask, where is this going? How do we overcome this apparent mental block?

Well, let us say for a moment, that it is all right to be angry. Our emotional conflict begins when we tell ourselves we should not be angry. Or we believe we cannot show we are angry. We pretend to be something we are not. This training is the origin of our emotional conflicts. These harmful habits are the origin of our distress. We train ourselves to be that which we are not. We slip into the habit of not being ourselves; we stop experiencing our true emotions. We have learned to become dishonest about ourselves and we have developed the habit of not knowing how we feel.

Over time, we come to dislike ourselves because we fail to stand up for our selves. This anger turns inward. So, we go and eat or have a drink or a smoke to blow off some steam. We feel better because we have been able to let go some of our frustration and distress, but we have turned

it on ourselves. Or even worse, we allow our anger to simmer inside: *They owe me! I hate them.* I suggest the person we hate is our dishonest self.

(b) ***Personal Responsibility***

What if we simply accepted our anger? What if feeling angry was acceptable? What if, despite our anger, we completely accepted our selves when our angry thoughts fell below the standard of our expectations? As bad as it may be, suddenly our anger has lost the power to control us. We are no longer driven by the force of training and habit to punish ourselves for experiencing angry thoughts.

We are not bad.
We are human.

(c) ***Complete Self-Acceptance***

We are told to relieve our stress and release our fears before they tie us in knots. Right! So, I ask, how do we begin connecting with this higher self? How can we know what this higher self really is? How can we know with certainty what we are supposed to be and do? What if we are already our authentic selves and we still experience anger and fear? Why are we sometimes threatened by outside forces in the world and feel that these forces affect and control us, while other times, we are not threatened at all by the same forces? Could it be that we get confused in trying to be this or that or the other thing?

We try to be:

- Nice
- Giving and forgiving
- Hardworking
- A good person

How about trying to be our selves for a change?

Do not use the following technique if you have thoughts of hurting another person or yourself.

It is designed to reduce fear and guilt to allow us to move forward in a positive direction in our lives. It is not to be used to justify aggressive behavior toward others or yourself.

(1) Exercise of Self-Affirmation

What if we learn to accept both our positive and our negative thoughts? What if when we are sad, we accept that experience of sadness. The emotional conflict that says that we should be happy will resolve itself and we will become happy again.

I recommend a simple exercise that focuses on changing our personal energy. Whenever you feel sad or unhappy, learn to repeat a self-affirmation to yourself, like:

Despite my anger, I fully and completely accept myself.
Despite my sadness, I fully and completely accept myself.
Despite my depression, I fully and completely accept myself.

(2) Training Our Mind

Our minds are amazingly flexible. If we train our minds, anything is possible. In fact, chemicals create our thoughts and our thoughts create chemicals. When we allow ourselves to accept our emotional conflicts, we become less tense. When we accept ourselves, the chemicals in our brain change. Over time, we will learn to experience more positive and less negative thoughts. Everything is a matter of training and the power of habit. Just as Prozac and Paxil, two popular anti-depressant medications, change the chemicals in our brains and allow us to feel more positive, so we can change the chemicals in our bodies by proceeding in a positive fashion rather than a negative one. In Chapter 2 we will explore several techniques that will help us release our fears and guilt.

Now, suffice it to say if we devote our minds to confusion, our minds will become a master of confusion and emotional conflict. If we devote our minds to the task of healing and self-acceptance, we will find that with time, patience, self-discipline and the right training (like the exercise of self-affirmation), our minds will begin to unknot themselves and we will begin the process of healing. More precisely, we must take responsibility for our own lives, our own healing!

11 Why Do We Experience Guilt?

If our fears lead to anger, pain and disease, what are the self-destructive effects of guilt? Why are we sometimes overcome by the sense of doing something wrong or failing in our obligations? Does guilt (like anger) imply a lack of self-acceptance and care for our selves? Why do we feel that what we have done is wrong? Why do we feel guilty and ashamed and believe we are failures whenever things do not work as expected? Why does guilt become our dominant emotion when we find ourselves feeling we are not good enough? Could our guilt be evidence of psychic masochism (our need to express criticism of our selves)? When self-blame and thoughts of guilt overtake our self-esteem and optimism, is the next step distress and disease of our mind and bodies?

(a) *Guilt Leads to Low Self-Esteem and Depression*

Feeling guilty can lead to feelings of low self-esteem. All too often, guilt leads to a sense of helplessness and worthlessness. We see ourselves as individual failures, failing in our relationships as a marriage partner or parent, our job. The list could go on and on. If low self-esteem is present long enough, we will develop other symptoms of depression including hopelessness. This depressed mood and low self-esteem can then lead to self-destructive acts. Why? The answer is that we are attempting to alleviate our guilt and suffering by punishing ourselves. These spontaneous impulses (which are often in response to strong and irrational desires) alter our brain chemicals; we then seek to improve the resulting imbalance through the consumption of dangerous materials or distracting activities.

For example:

Smoking cigarettes releases endorphin and adrenaline, giving the smoker a greater sense of well being and more energy (who would willingly give that up?).

The consumption of simple carbohydrates (foods rich in sugar and starch) temporarily improves our feelings and mood when we crave sweets, but the improvement is only transitory and requires increasingly higher quantities of carbohydrates to accomplish the same chemical state (a downward spiral of over-eating).

Alcohol and other intoxicants (such as narcotics) have a significant anti-anxiety effect and lower inhibitions of emotions, allowing expression of emotions usually inhibited. Unfortunately they also act as depressants and impair our judgment and reaction times. Alcohol and other intoxicant abuse can also be a marker of carbohydrate craving.

Participating in risky lifestyle behaviors, such as reckless driving and dangerous sports.

(b) *Chemical Markers*

Now, we ask is there a chemical marker in our bodies for guilt? A clue to answering this question is to look at the brain chemicals that raise self-esteem. One of the best classes of medications for raising self-esteem (and improving other symptoms of depression) are the selective serotonin re-uptake inhibitors (SSRI antidepressant medications) such as Prozac, Paxil or Zoloft. These medications raise brain serotonin levels and thereby improve depression and our sense of self-esteem.

So low self-esteem is associated with low brain serotonin levels. But which came first? Could it be that guilt and low self-esteem lead to low brain serotonin levels (the opposite of self-

acceptance promoted by higher brain serotonin levels induced by the SSRI antidepressant medications)?

Also, if it is true that the SSRI antidepressant medications raise brain serotonin levels and thereby improves self-esteem, could it also be that improved self-esteem (and the release of guilt) raises serotonin levels? There is no apparent reason it should not.

When we feel guilty, negative self-esteem begins to set in. We should be better than this. Then we ask ourselves, *So what*? A downward self-destructive pattern may begin. We can begin to develop some of the symptoms of depression including lack of interest in usual activities, insomnia, and depressed mood. Our serotonin levels have dropped. Our response to the distress we are feeling is to reach for a variety of substances to help us overcome our guilt and keep going. So we reach for food and sweets rich in sugar (a cookie or two) or alcohol (a drink or three). What do these substances have in common? Simple carbohydrates and alcohol both will offset our low serotonin levels, if only transiently.

What is the evidence for this?

(1) Sugar, Serotonin and Self-Esteem

Disorders of carbohydrate metabolism are associated with disorders of serotonin:

- There is a strong association of carbohydrate craving with seasonal affective disorder (depression in the winter). Consuming sugar gives transient and limited relief to depressive symptoms, even in patients with normal glucose tolerance.
- There is a high incidence of depression in patients with diabetes.
- Elevated blood serotonin levels (such as with the medication Phen-Fen) reduce appetite and promote weight loss.
- There is a subset of alcoholics who crave carbohydrates when they are abstaining from alcohol.
- A very low carbohydrate diet (the avoidance of all sugar and starch) improves mood, seasonal affective disorder, premenstrual symptoms, menopausal problems and diabetes.
- Chromium supplementation improves insulin resistance, diabetes and chronic low-grade depression.

(2) Which Comes First: Depression or Diabetes?

At least in patients prone to insulin resistance and carbohydrate craving *(is that most of us?),* the story could be as follows:

- Unresolved guilt leads to lower self-esteem.
- Lower self-esteem leads to lower serotonin levels.

- Lower serotonin levels increase carbohydrate craving.
- Greater carbohydrate consumption leads to greater insulin release and weight gain.
- Weight gain leads to increased insulin resistance and the development of diabetes.

Of course, it could also happen this way:

- Diabetes causes wasting of important minerals including chromium (this is already established; most patients with diabetes have moderate to severe chromium deficiency).
- Chromium deficiency leads to lower serotonin levels, depression and worsening diabetes.
- Chronically elevated blood sugars or insulin levels may also have a direct depressive effect on the brain (similar to how we become resistant to the effects of narcotics and sleeping pills with repeated use).
- It is clear that patients with diabetes do develop nerve problems and loss of brain volume over time and frequently are depressed.

(3) Which Comes First: Depression or Cancer?

Many of the metabolic changes associated with depression are considered growth factors for tumors, so it is logical to ask whether our guilt could eventually cause cancer in our bodies? Perhaps! The reason I say perhaps is based on three different clinical research studies:

- Increased cortisol and adrenaline release (associated with acute and chronic stress reactions) lead to increased insulin resistance. It is clear that insulin and insulin-like growth factor (IGF) both greatly stimulate the growth of cancer of the breast, colon, prostate and pancreas.

- The carbohydrate craving and increased consumption of foods rich in sugar that is seen in patients with depression also worsen insulin resistance and tumor growth. There are trials in Europe where insulin and glucose are infused in an attempt to get the tumors into a rapid growth phase just prior to chemotherapy (so tumor killing will be more effective). We can and do increase our insulin and glucose just as effectively with a big plate of pasta or a baked potato. So, we ask, if diet can give rise to depression, what is the effect of depression on tumor growth? Can depression effect the spread of cancer? It would appear that this could be a possibility. Remember the women with the highest levels of insulin resistance had eight times the recurrence of their breast cancer over 7 years.

- The lack of a positive support group has been shown to significantly shorten survival in women with breast cancer (mood affecting outcomes in patients with

established cancer). Dean Ornish, M.D., Director of the Preventive Medicine Research Institute and author of Love and Survival: Eight Pathways to Intimacy and Health, found that weekly group support sessions doubled the length of survival of women with breast cancer that had already spread throughout the body. We ask, if our mood can induce cancer to act in a specified manner once cancer is present in our bodies, can our mood also be the generative force that is the origin of our cancer? Can guilt and depression cause cancerous events to happen, since it has been shown that the lack of depression causes something to happen to metastatic cancer? Do the actions in our minds and body tend toward a particular end? If so, then, we can affect that end!

12 Now, Healing Ourselves

By understanding our reactions to fear, anger, and guilt, as well as the reactions of others (to fear, anger and guilt), we are better prepared to change our approach to life and stay healthy.

No one can heal us.
We need to consciously set out to heal ourselves.

We must trust what we know in our bodies. Changing our mind involves undertaking a positive approach to life. We must accept and believe that our bodies are our allies, and that our body will always point us in the direction we need to go next.

The Take-Home Lesson:

Fear causes pain and disease.
Guilt causes suffering, disease and death.
Forgiveness works.
Forgive others, and especially forgive yourself.

Let go of anger, fear and guilt and move forward in life with a positive purpose.
Give of yourself to others.
Give to yourself what you need to continue to give.

George Steele MD

We can begin to heal our lives when we begin to value our bodies
and honor their messages
instead of feeling victimized by them.

Christiane Northrup MD

If at first an idea is not absurd, then it is not worth having.

Albert Einstein

$E=MC^2$

Energy is equal to mass multiplied by the square of the speed of light?

Yeah, right.

2

TOOLS FOR HEALING

1 Changing Our Minds

By understanding our reactions (to fear, anger, guilt and depression) and the reactions of others, we are now able to change our approach to life. Changing our mind involves taking a positive approach to life. Chapter 1 presented information concerning how our bodies respond to negative thoughts and harmful habits. This chapter describes tools to transform our negative thoughts to more positive ones. This is important because we now know that negative thoughts affect more than just our brain. Negative thoughts can affect every cell in our body right down to those important white blood cells that fight infection or those tumor cells that are growing throughout our bodies. We grow and kill cancer cells continually throughout our lives; sometimes these cells get ahead of our ability to recognize and kill them.

Christiane Northrup M.D., co-founder of the Women to Women Health Center in Maine (a model for women's clinics nationwide), past president of the American Holistic Medical Association, and author of Women's Bodies, Women's Wisdom put it this way:

> We can begin to heal our lives when we begin to value our bodies
> and honor their messages instead of feeling victimized by them.

Some of her patients complained:

> Blame? Are you saying I caused my cancer?
>
> No.
>
> But for healing to occur, we must come to see that we are not so much
> responsible for our illnesses as responsible to them.

2 Our Barometers of Health

Patients frequently frustrate physicians when they fail to get better. Something is holding them back. Many patients have tight muscles in their neck and upper back. When they become angry and resentful their muscles tighten and burn. For many patients, this pain occurs daily, and alerts them to their negative thoughts and habits. I call these problems our barometers of health (they indicate to us how our health is doing).

These barometers of health are usually an indication of an unhealthy approach to life and can include the following:

- Neck and upper back pain
- High blood pressure
- Heartburn, trouble swallowing and the Irritable Bowel Syndrome
- Depression, anxiety and panic disorder
- Headaches
- Chest pain and heart disease
- Cravings for sweets, foods rich in sugar or alcohol and other intoxicants

3 Changing Our Thought Patterns

Table 2-1 on page 35 is a directory of negative thoughts and associated medical complaints. Look at the problems on the right side of the table, and then review the underlying issues to the left to see if any of them speak to you (such as neck pain associated with anger, resentment and bitterness). Table 2-2 follows on page 37, which is a corresponding set of goals or affirmations to overcome the medical complaints. By offering positive thoughts to replace negative thoughts, I have sought to show how a change in thought patterns can result in a change in health.

(a) *The Answer To It All*

Let me tell you an ancient account of a man who owned a river. Imagine the river as the personal energy that flows through your body and your life.

A man owned a river by a bridge. He loved standing in his river and feeling the cool water on his feet. The water was used for drinking and irrigating his gardens; he loved his river. One day there was less water in his river and he began to think there soon would not be enough water for him. He looked at the water flowing under the bridge and regretted having lost that water. So he built a dam across the river at the bridge. The water began to back up. At first, he seemed to have more water, but then the water began to flow around the bridge. The more it flowed, the deeper the new channel became. Soon all of the water was flowing around the bridge. When the man stood in his river it was now calm, warm, brackish and filled with algae. Realizing his mistake, he soon began to take down the dam. He watched as the water flowed under the bridge again. Soon ever

more water flowed under the bridge and his river became cool and clear again. He realized the deeper he dug the river under the bridge, the more water would flow through his river.

Now imagine this river as the energy of our life. When we think we do not have enough of the things of life we begin to hold on to them. We begin to build our dam. Life stops flowing through us and begins to go around us. The dam we build is built of the things we hold onto to reassure us we have enough.

What is the answer? The answer is that we will never have enough things of life until we learn to let our rivers flow. We will only have enough personal energy when we share our river and our water with others. We need to share our positive thoughts. We will feel we have enough of the things of life only when we discover how to give our positive thoughts and energy away to others. Only then will life really begin to flow to us and through us.

(b) *Our Personal Energy*

Why do some rivers flow freely and effortlessly while others always collect debris under their bridges? Imagine us as this man. What is it like? Standing in the river, debris keeps floating down the river, collecting under the bridge until the flow stops. Some days it seems like we spend our whole day cleaning out the debris collecting at the bridge. When we seem to get the river flowing freely, more logs and silt and branches get lodged and the flow slows. Some days it is a full-time job to keep the river flowing. Other days it seems to flow freely and effortlessly past us under the bridge. We breathe in, we breathe out, we visualize the clearing of the stream; we visualize the river flowing. Then we feel better, for a few minutes anyway.

The plan for Staying Healthy is to influence the flow of the river through the bridge. One of the best ways to do this is by working with our body's personal energy.

Thought leads to action.
Action leads to habit.
Habit leads to attitude.
Attitude leads to character.

(So think good and loving thoughts!)

(c) *Understanding the Power of Positive Thoughts*

So, the skeptic asks, how do the river and the bridge relate to our health? Why is a freely flowing river necessary for our health? Could this have something to do with our body's energy fields, a scientific tool first identified by the sages of India more than two thousand years ago? Can improving our personal energy lead to healing? Can we combine our theoretical understanding of this ancient practice of controlling the flow of personal energy through our bodies with an approach to understanding the probable causes behind illness in our bodies?

When I reviewed the ancient science of the different energy fields of our body, I began to better appreciate how this ancient classification of illness could provide us with a tool for changing our thought patterns. With the aid of this mind-body approach to healing, I observed the following in my patients:

- Neck and upper back spasms from anger, resentment and bitterness often resulting from work or marriage responsibilities. Pain reduces or resolves when patients finally address their unresolved anger and begin to ask for what they want in life and work.

- Middle-age women who are concerned about getting older and complaining of their reduced libido (lack of sexual expression). Sexuality returns when they learn to appreciate their bodies and positions in life and society.

- Angry men complaining about the bone chip in their shoulders that really have a chip on their shoulder. Pain decreases when they decide to take charge of the disorder in their lives or they finally address the death of a business-partner, a child or a parent.

- Patients rejected by their families develop terrible pelvic / low-back pain, knowing their pain is related but unable to let go of the sense of abandonment. Back spasms resolve when they reconcile with their families.

- Following arguments, patients discover they are suddenly unable to swallow their food. Swallowing difficulty resolves when they understand they have trouble verbalizing their feelings or having their feelings heard and accepted.

- Grown children visiting their overbearing parents develop terrible abdominal pain and cramps in response to emotional conflicts. Abdominal pain resolves when they learn to feel comfortable exerting their will.

- Tightness in the chest due to stress in their relationships with family or co-workers. Chest pain resolves when patients deal with their fear of intimacy or loss.

- Overeating or over-drinking to compensate for their inability to honestly express one's feelings. The problem resolves when patients learn they are valued and loved by others.

What is unique about this mind-body approach is, instead of focusing on illness, our focus shifts to getting healthy. The whole point is to get past our pain, to get healthy. We can learn, over

time and with practice and discipline, to overcome the emotional conflicts and harmful habits that keep us from becoming healthy.

4 Negative Thoughts Which May Underlie Our Medical Complaints

Illness may correspond to patterns of stresses and attitudes that influence corresponding areas of the body. Table 2-1 on page 35 presents our emotional and physical vulnerabilities and associates them with illness patterns. These associations are not one-on-one combinations; rather, each group of thought patterns is related as a whole to the corresponding group of medical complaints.

(a) *Healing Neck and Upper Back Pain*

Using this mind-body approach to healing, we find that the probable thought pattern that may underlie neck and upper-back pain revolves around relationships. The person may lack a sense of commitment and emotional connection with their marriage partner, family, friends or co-workers. Or alternatively, they may have had experiences of grief and great unhappiness that they have yet to be resolved. Either way, they often have learned to:

- Withhold their affection.
- Experience generalized feelings of anger and cynicism.
- Lack optimism and hope in life.
- Withhold forgiveness of mistakes and offenses by others (and themselves).
- Feel angry, resentful, bitter and hostile.

(b) *Negative Thoughts*

Their emotions have become stuck in a group labeled Issues of Love. Patients with medical complaints in this group may lack a sense of hope in life. They often find themselves in the habit of having negative thoughts:

- Life is difficult; life is a burden.
- You can never fully and completely trust anyone.
- Things will never turn out well.

(c) *Healing*

To heal, these patients need to change their personal energies around the issues of forgiveness and compassion. They need to learn to trust themselves and others. They need to experience the positive emotions of acceptance for themselves and others. I suggest their healing self-affirmations include the following:

- Love is a strong force in my life.
- I have love to give away.
- I have money to give away.
- I am free to move forward with love and positive emotions in my heart.

The critical importance of this mind-body approach is seen in the strong association of hostility with coronary disease. Dean Ornish, M.D. proved that the symptoms of heart disease could be reversed with a regimen of low-fat diet, exercise and stress reduction. It appears that the critical factor in the Ornish program was the meditation. Those who did not participate in the meditation component did not receive benefit from the overall program.[91] It appears that hostility is one of the best predictors of heart disease, so let it go already (I'm trying, I'm trying!).

[91] Personal communication with Christine Grad MD

Table 2-1
Guidelines for Healing

	Issues Which May Underlie Complaints	Medical Complaints
First Survival	Concerns with physical safety and security of my family Feeling unsupported in life Concerns with ability to provide for life's necessities; Fear of failure Inability to stand up for self Lack of social and familial law and order.	Anxiety Insomnia Low back pain and sciatica Foot, ankle and knee pain Leg weakness Immune disorders Colon and pancreatic cancer
Second Sexuality	Feeling blame and guilt Fears about money and/or sex Difficulties maintaining power and control Frustrated creativity (your ideas aborted) Concerns about ethics and honor in relationships Concerns of aging; not feeling good enough	Menstrual and vaginal problems Pelvic/low back pain Urinary problems Erectile problems Lack of sexual expression Prostate or ovarian cancer
Third Power	Low sense of self-esteem, self-confidence, and self-respect Fear and intimidation, Desire for protection Lack of trust, Deep criticism of authority Lack of care for oneself and others Fear of the future Responsibility for making decisions Sensitivity to criticism Uncertainty concerning personal honor	Abdominal pain or cramps Accidents Arthritis Headaches Heartburn Insomnia Overweight Diabetes Anorexia or bulimia
Fourth Love	Loneliness and/or lack of commitment Lack of love for self or others Withholding love and consideration Anger, resentment, or bitterness Life is a burden Lack of forgiveness and compassion for family, self, or others Unresolved grief Rage at being left out Lack of hope and/or trust	Upper back, shoulder pain TMJ pain Numbness and/or tingling Hypertension Depression Chest pain, Asthma Coronary Heart disease Congestive heart failure Breast cancer Lung cancer

	Issues Which May Underlie Complaints	Medical Complaints
Fifth Expression	Difficulty making decisions of choice in life Reduced strength of will Personal expression inhibited or ignored Not following one's dream Unable to use personal power to create Difficulties in expressing faith and knowledge Difficulties in decision making	Raspy throat Lump in throat Chronic sore throat Addiction to drugs, alcohol, cigarettes, sugar, etc. Swallowing difficulties Thyroid problems
Sixth Vision	Lack of self-evaluation Feelings of inadequacy Lack of openness to the ideas of others	Neurological disturbances Cataracts and glaucoma Retinal problems Floaters
Seventh Spirituality	Unexpressed faith and inspiration Lack of spirituality and devotion Lack of selflessness and humanitarianism Difficulty in expressing values, ethics, and courage	Chronic fatigue that is not related to a physical disorder. Extreme sensitivity to environmental factors.

From my patients and the works of Carolyn Myss, Anodea Judith and Louise Hay

5 Where We Want To Be

Lack of acceptance of others and ourselves is what causes our own pain and illness. Acceptance can make us healthy and lead us to healing. Table 2-2 contains phrases which remind us of positive thoughts which will reduce some of our medical complaints identified in Table 2-1 (Guidelines for Healing). These thoughts remind us of what our goals in life can be:

I trust the process of life.
My body is beautiful.
I create wonderful things.
I have love to give away.
I see beyond myself to who I will be.
The truth is within me already.

Table 2-2
WHERE WE WANT TO BE

	To Be (or not to be?)
First (Survival)	The Earth supports me I am connected to my community I trust the process of life I am safe
Two (Sexuality)	I am a sexual being I enjoy sexual intercourse I am comfortable with my body My body is beautiful
Three (Power)	I am whole I create wonderful things I have energy to move forward in life The power within rejuvenates me each day
Four (Love)	Love is a strong force in my life I have love to give away I have money to give away I am free to move forward with love in my heart
Five (Expression)	I have found my way, and I will share it with others I have a gift to share with others Others need what I have to share The world needs my expression of love
Six (Vision)	I look to freedom and the truth The only constant is change; I look for growth in change I see beyond myself to who I will be My sixth sense sees both my opportunities and any danger confronting me and protects me
Seven (Spirituality)	The truth is within me already I will create and repeat the truths of my ancestors I am connected to my community I am filled with the love of God

Adapted from the works of Carolyn Myss, Anodea Judith and Louise Hay

6 Tools for Healing: EFT

The Emotional Freedom Technique, known simply as EFT, is a tool to help us release stress, negative thoughts and harmful habits that took many of us a lifetime to acquire. This self-help technique is one option in my *Staying Healthy* approach to maintaining our health and avoiding illness. The EFT will help enhance any healing process and help bring more awareness to whatever we are going through.

(a) *The Emotional Freedom Technique Helps Reduce Emotional Conflict*

People try hypnotherapy, kinesiology, Reiki, meditation, relaxation and autogenics and numerous other holistic modalities. Like most people, I thought that true healing was extremely difficult to achieve and that genuine self-awareness and understanding of our emotional conflicts and thoughts were only possible for people like monks and mystics in far-off caves and monasteries. Yet, I wanted to find a tool that would help my patients in my practice of medicine at the University of Pennsylvania Health System.

When I first read about the EFT, my response was *This is absurd; who could believe this would work*? The technique consisted of tapping a series of points on your head, chest and arms that corresponded to acupuncture points in the energy meridian system while repeating self-affirmations directed at reducing emotional conflict. I could see myself tapping my forehead on the train or while stopped at a traffic light. But then again, I was desperate – I wanted to greatly enhance the healing of my patients. Many of my patients were failing to change their lives and thereby their health, notwithstanding the fact that they knew they were on a slippery slope to developing disease and illness if they did not change. These same patients had such anger and fears; they were simply unable to overcome obstacles to follow my medical advice. Even down to *You can't take away my pasta, bread, potatoes and rice! They provide my only enjoyment in life.* I began to ask whether these patients could use the easy-to-do process of the EFT to clear their thoughts and harmful habits that were adversely affecting their health.

> How can we overcome our negative thoughts and become better able to care for ourselves and stay healthy?
>
> How can we release our anger, fears and all types of emotional conflicts, so we can experience a healthy life filled with joy, love and freedom to fulfill our hearts' desires?

Dr. Callahan, the psychotherapist who had first written about the EFT process more than twenty years ago, reported the EFT was very helpful and effective for many if not most of his patients. So I decided to give it a try to see whether it would expand my own potential for healing. I rediscovered a peace I had not experienced in years (and lower blood pressure). I then decided to offer the EFT to several of my patients who were having difficulty following my medical advice.

(b) *How To Do The Emotional Freedom Technique*

The greatest challenge we face in doing the EFT is opening our minds enough to consider that it is possible to overcome negative thought patterns in a short time. Patients who have tried the EFT often believe that their thought patterns are going to be difficult and painful to release. Amazingly, our limiting beliefs are often more challenging than our thoughts themselves.

(1) Create Affirmations

The first step in the EFT is to create one or more affirmations that we will use to adjust our negative thoughts. Our self-affirmations should address our medical complaints and whatever negative thoughts are holding us back from feeling positive about our self and feeling completely healthy. While acknowledging our medical complaints and negative thoughts, we must focus on full and complete acceptance of our self. Trying to fix our medical complaints and negative thoughts will not help us; incorporating positive acceptance of our self is a better way to stay healthy. For example:

Despite the tightness in my neck and upper back, I fully and completely accept myself

Despite my stomach cramps, I fully and completely accept myself

Despite my anger, resentment and bitterness, I fully and completely accept myself

Despite my sadness and thoughts of gloominess, I fully and completely accept myself

Despite my inability to stand up for myself, I fully and completely accept myself

Despite my craving for sweets and foods rich in sugar, I fully and completely accept myself

Despite my craving for alcohol and other intoxicants, I fully and completely accept myself

Despite my fear of the future, I fully and completely accept myself

Despite my unresolved grief and great unhappiness, I fully and completely accept myself

Despite my feelings of guilt and shame, I fully and completely accept myself

Using the examples listed above, construct your own self-affirmations. The construction I suggest is as follows:

Despite my _____, I fully and completely accept myself.

Why do we say fully and completely? Isn't that redundant? Not really, we must fully (*entirely*) and completely (*totally and utterly*) accept our self. After we have our self-affirmations, learning the tapping technique is simple.

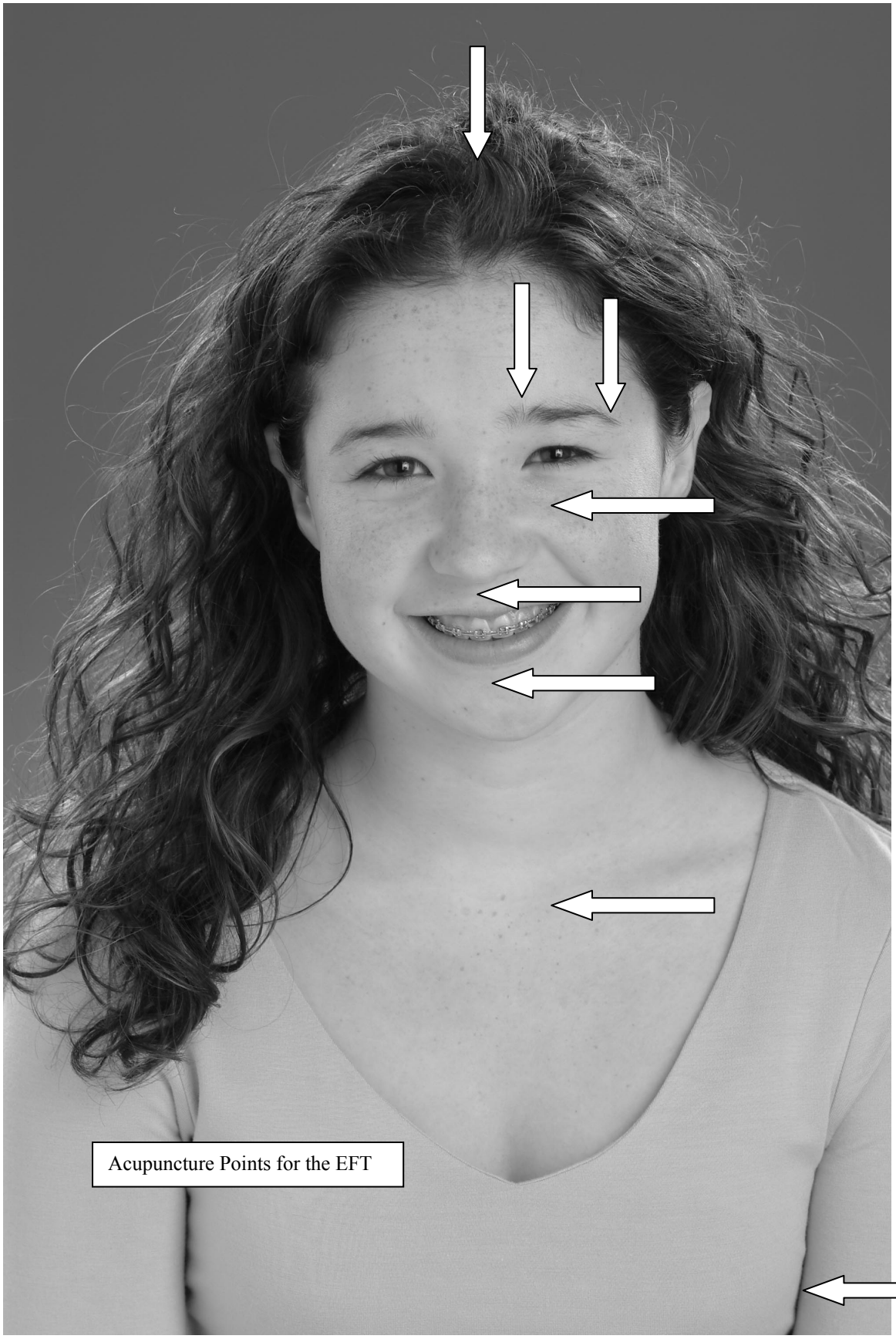
(2) Tap Nine Acupuncture Points

Next, we tap on a series of points on our bodies that correspond to acupuncture points in the ancient energy meridian system. It appears that by tapping on acupuncture points, you clear negative thought patterns that are blocking your healing.

- You will tap on a series of nine acupuncture points starting on the top of the head and proceeding down the body to the wrists.
- Tap using both the index and middle finger simultaneously of either hand. Use a firm tapping motion, but not enough to cause pain or soreness.
- Each point is tapped seven times while repeating a self-affirmation at each point. The exact number of taps is not really important, but the conscious repeating of the self-affirmation is important.
- You may repeat the self-affirmations either aloud or silently.
- Focus on the meaning of the self-affirmation statements each time they are repeated.
- When finished tapping the nine points, repeat the series while stating the self-affirmation beginning at the top of the head.

The acupuncture points are as listed below and illustrated on the following page:

1. Top of head.
2. Inner aspect of eyebrow (on the bony prominence of the lower forehead).
3. Beside the eye (on the side-not the front-of the skull next to the eye socket).
4. Under the eye (on the bony prominence about one inch below the pupil).
5. Under the nose (just above the upper lip).
6. Above the chin (half way between the lower lip and the end of the chin).
7. Junction of the breastbone, collar bone and first rib.
8. Under the arm (middle of armpit at the level of breast nipple in men or the bra strap in women).
9. Inside of both wrists.



Acupuncture Points for the EFT

Do not use the following technique if you have thoughts of hurting another person or yourself.

It is designed to reduce fear and guilt to allow us to move forward in a positive direction in our lives. It is not to be used to justify aggressive behavior toward others or yourself.

(c) ***Getting ready to do the EFT:***

Internal conflict misdirects our energy. Conflict arises from feeling guilty, inadequate, angry or powerless. To avoid conflict with others, we often turn this conflict in upon ourselves.

Psychic dissonance leading to psychic masochism.

We beat up on ourselves because we are handy victims. We eat too much, drink too much, drive too fast, or spend too much. We do things that make people angry with us. We don't accomplish other things and that also makes people angry with us. Why do we beat ourselves up so? When am I going to start listening with my heart instead of my brain? What is it to listen with one's heart anyway? To listen with love instead of fear? To listen with love instead of anger?

I am angry about the phone bill. I am angry about the cost of heating the house. I am angry about the amount of TV the kids watch. The traffic lights on Montgomery Ave. The greed inherent in our culture. Etc. But… I AM is love. But, i am (little I) is not. To live in the process of life (being in the present) is unpleasant if the present is filled with anger and frustration.

I have much to be angry about.
or
I have much to be thankful for.

EFT is designed to reduce or remove our internal conflicts and thereby reduce our psychic masochism and allow us to focus on what we would really like to do. Before beginning EFT, it is good to examine what is causing your immediate distress. Be it problems with work or arguments with children; create an affirmation concerning that problem. Now begin by tapping the inner aspect of the eyebrow 7 times focusing on that thought.

Despite my anger and frustration with my boss, I fully and completely accept myself.

Try to release yourself from that conflict. Do this a couple of times. This primes the pump for doing the whole series of EFT by reducing some of the distraction and helping you to focus on the task at hand.

EFT is a tool to reduce inner conflict. It is important to decide what you are going to work on prior to beginning. Unfortunately, most of us have plenty of issues to deal with. As we reduce our inner conflicts, it frees our energy to work on other things. Other things we actually want to do, like painting a picture, planning a trip, working in the garden, going to see an old friend, volunteering at a soup kitchen, or writing a letter. As long as we are tied up worrying about things we cannot change, we will not have the time or energy to accomplish our destiny, whatever that might be.

(d) ***Clear negative thought patterns.***

While this tapping of acupuncture points sounds dramatically different from conventional medical wisdom, it has been consistently and understandably greeted with skepticism. The EFT, however, is not alone in this. For example, before former President Richard Nixon went to China in 1971 and Pulitzer-winner James Reston's compelling memoir that same year, acupuncture was considered arcane. Today, however, acupuncture has become part of the mainstream healthcare repertoire following demonstration of safety and efficacy by rigorous scientific investigation. Today acupuncture is often prescribed to manage pain and sometimes to control the nausea of chemotherapy. More recently, investigators have reported positive results in the use of acupuncture to treat cocaine addiction. So, there are indications that an understanding of acupuncture may advance our understanding of how healing works.

By simply tapping on acupuncture points on our body, we can use this technique to clear negative thought patterns that are keeping us from *Staying Healthy*. Trust me, the EFT is usually fast and amazingly effective! We hold in our hands an outline of the modernization of an ancient tool for healing that has been in use for more than twenty years in the United States. By keeping an open mind to this self-help tool, we can allow the results to speak for themselves.

7 Tools for Healing: Mental Imagery Helps Us Relax

Another option to help us stay healthy is learning to relax. Call it mind-body control or mind power or whatever. If we are determined to improve our health through knowledge of our mind, then we will probably want to understand and experience the power of the mind when we are in a state of experiencing relaxation. The most important thing to remember is that we must learn how to see our mind and body in a new way.

To start, permit me to introduce mental imagery as a tool to help us relax. Simply remember the last time you were truly relaxed? Mine was lying in a fourteen foot sailing skiff, out in the water, sail down, resting. The water holding the boat up, rocking me. No place to go. Nothing to do. Nothing I could do, even if I wanted or needed to. The sound of the wavelets hitting the side of the boat. The wind in the rigging. All is peaceful. My blood pressure is very low. My pulse is slow. Nothing to do. Nowhere to go. At peace, fully and completely.

Now, we can return to that very spot this minute. All we need to do is close our eyes and see it – the calm water, the small sailing skiff. And feel it – gently and rhythmically rocking us. And hear it – the faint, melodic sound of the wavelets and rigging. And smell it –the wind and gentle breeze against our damp faces and bodies. And taste it – the moist, crisp salt air. We are already there. This is complete relaxation using mental imagery.

So what is this relaxation good for other than lowering our blood pressure and pulse (and apparently our risk of heart disease, according to numerous medical studies)? Well, when we consistently practice mental imagery to help us relax over time, it becomes integrated into our body's autonomic response system and allows us to remain more alert, calm and energized even under the most stressful of situations. The experience of relaxation can promote our physical health and emotional well-being by shifting our mental state from a passive stance – one that gives the outside world a lot of control over our thoughts – to a more self-directed world that recognizes the validity of our own inner authority.

8 Tools for Healing: How to Relax with the Autogenic Technique

I have found that autogenic technique is an effective form of mental imagery for my patients and me when we are attempting to relax. Autogenics is also used by medical practitioners in applied psychophysiology, pain management, stress management, behavioral medicine and biofeedback – today, it is now part of the mainline healthcare repertoire.

To illustrate how autogenics can help us with relaxation, imagine that your hands and feet are really cold? If you can imagine this feeling of coldness, then you may be able to appreciate the story of how this deep relaxation technique of autogenics prevented frostbite in mountain climbers trapped by a blizzard. The climbers who knew autogenics and imaged themselves warm had no frostbite; many of the climbers who did not know this relaxation technique developed severe frostbite.[1]

So, exactly what is autogenics? Well, autogenics can be defined as a form of relaxation involving both the mind and the body. It is a series of relaxation exercises built on the visualization

of warmth and heaviness in the extremities, abdominal warmth, and cooling of the forehead, as well as regulation of cardiac activity and breathing.

(a) ***Relax and Eliminate Stress from Your Body***

Before beginning an autogenics exercise, find a quiet place and sit comfortably. Try to relax your body and release the stress within your body. It is a difficult task, but with lots of patience and practice, you will eventually succeed. Just remember that complete relaxation is a learned skill that we must all acquire. As a self-motivated form of relaxation, autogenics helps reduce stress and body fatigue.

(b) ***Relax and Eliminate Stress from Your Mind***

Next, try to let go of all other thoughts and feelings that come from within. Don't think, but just be. Experience the gift of aloneness, your unique and self-acknowledged inner feelings. Those who apply the technique of autogenics are able to become extremely aware of their own internal needs and are provided the mental skills to address those needs.

(*c*) ***Repeat an Autogenic Thought Pattern***

Finally, I suggest trying the autogenic thought pattern that works the best for me. Simply: Repeat an autogenic thought three to eight times, leaving a five-to-ten second pause between each thought.

My favorite autogenic thought is adapted from the book, Autogenic Training by Wolfgang Luthe (*and proven to prevent frostbite*):

> My arms and hands are heavy and warm.
> My legs and feet are heavy and warm.
> My jaw is heavy and relaxed.
> My abdomen is soft.
> My forehead is cool and calm.
> My heartbeat and breathing are regular.
> I am relaxed from head to toe.

10 Overcome Obstacles to Experiencing Negative Thoughts and Harmful Habits

It is amazing that relaxation with the autogenic technique could prevent physical harm (*frostbite*). But, of course, our nervous system controls our vascular system. So why would this not be true (*if our vascular system can produce heart attacks, why would it not also be able to prevent frostbite*)? There are indications that this relaxation technique may prove effective in preventing and treating chronic diseases, as well as advancing our understanding of how healing works. At present, however, we are still awaiting scientific validation of its worth – and we are left, along with the EFT, to decide whether to adopt ancient techniques described many centuries ago by monks and mystics in far off caves and monasteries.

(a) *Freedom of Our Will*

All this reminds me of an incident when a doe crossed the road ahead of me while I was driving home one evening. I slowed my old car, because where there is one deer there are usually more. Then a tiny fawn no more than a few days old came out of the woods tottering across the road in front of me. When it had crossed the road, it had to climb a bit of a hill, which it attempted several times before finally succeeding. The doe stood at the top of the hill waiting for the fawn. When the fawn finally joined her, she turned and continued on. I guess the mother's thought was *If he makes it across the road, good. If he doesn't, so be it*.

Now, I ask, when will we allow our marriage partner, family members, friends, co-workers and ourselves such freedom? Can we make the decision to lead by example, and give others and ourselves the freedom to learn by experience, each of us taking responsibility for our own actions and letting others determine their own fate based on their own capabilities. This will lead to freedom of our wills and possibility for improvement in others and ourselves.

We cannot receive wisdom.

We can only discover it through experience from which no one can protect us.

Marcel Proust

3

SEX AND SPIRITUALITY

1 Sex as (Mis-)Understood by Some Men

Our wives read romance novels and dream of a man who will sweep them off their feet and…

We men, on the other hand, peruse photos of nude women (or the sexy pictures at the beer store, the auto parts store, the underwear ads in the NY Times, or just the skirt on the street) and dream of sexy aggressive women who want to have sex with us right here and right now. With low sexy voices.

So, there you are, lying in bed next to your wife. Next to your sexual partner. Neither your partner nor you saying or doing anything. Waiting for the other to do something. To take the first step. But you are wondering why this partner of yours won't do what seems so obvious. Come on, what is taking so long? Why won't she ever make the first move to say it is ok? She has everything. The house. The kids. Etc, etc, etc. Why should I have to do everything? Why should I have to start this? It's not fair, and I resent it. So I am just going to lie here and do nothing. I guess I'll just go to sleep. Serves her right.

Goodnight, dear.
Goodnight. …….Hmmmrph.

So where does this lead? Questions many patients have asked me:

Should I have an affair?
Should I leave my wife?
We have not had sex in a year.
We have not had sex in four years.
I want to be in love again.
I want to live again.

So what the hell are we waiting for? Someone to make everything ok? Ha! Anyway, it is time for us to grow up, take responsibility for our needs and ask for what we want and need. To actually ask our wife for what we want. But I promise you, she does not know what you want

because you have probably never told her. Don't expect her to know anything. Remember, she has been reading romance novels (and therefore she is probably clueless). She probably doesn't even like sexy pictures. She thinks they are disgusting and degrading to women.

But we men are designed to want sex and to have sex. We are sexual animals (the key word is animals it seems). But we can share this with our spouse. She has, after all, stuck by us through thick and thin, sex and no sex, etc, etc, etc….

So how do you start? Well, you tell her that you were told that it is totally unacceptable to have a marriage without regular sex. Period. No rebuttal. That means sex at least once weekly. Talk about it. Or maybe twice a week. Now that would be novel.

Totally unacceptable to have sex less than once weekly. Totally.

So figure it out. Go ahead and give her this book. Let her blame me. But please have sex with your wife. It is lifesaving for both of you. You need to give. And she needs to receive. You both want and need that. So let's get on with it already. End of story.

But not quite…… The older you get the less you sleep. Or is it the less you sleep the more you age?

The corollary to this:
The older you get the less you have sex. Or could it be the less you have sex the more you age?!!!

2 Choosing the Depression/Early Death Option

The purpose of man is to please woman (and move the big stuff around).
The purpose of woman is to rule the world... with love.

The strength of man is in giving.
The strength of woman is in nurturing.

(But read on, please. This is not quite all)

Once upon a time women ran our society. Our God was a Goddess of love. Men spent their days hunting, having sex, and moving big stuff around that the women could not move. Men were happy. Women were the priests, the shamans, the governors, the gatherers, and the nurturers of society. Society was based on love and sharing. Women were happy.

The physical structure of our brains still reflects this. When the male brain is resting, PET scanning of the brain shows that the area of the brain that is most active is the lowest (most primitive) part of the limbic area (the area that produces emotion). This area is associated with

aggressive behavior and with sexual desire. When the female brain is resting, PET scanning shows that the area of the brain that is most active is a higher (more advanced) part of the limbic area. This area is associated with nurturing and with love.

So when a man's brain is resting, he feels like going out and killing something, or having sex with the next potential partner walking by. When a woman's brain is resting, she feels like having and raising children or improving the community, or perhaps having sex with the person who would be a good partner in life.

Lower limbic (Fight/kill/sex) versus upper limbic (nurture).
It is sometimes difficult to engage a father with his baby.
It is almost always difficult to separate a mother from her baby.

(a) ***But I have a problem with all of this***

The preceding paragraphs have attempted to separate us into a two-sided species, man versus woman, while instead we are all a melding together of masculine and feminine characteristics. I am not man, whatever that is, but some complex combination of emotions, thoughts, and tendencies that cannot be characterized as wholly masculine or feminine. So I believe a closer rendition of the true meaning of life is as follows:

The purpose of the masculine is to please the feminine
(and move the big stuff around).
The purpose of the feminine is to rule the world.... with love.

The strength of the masculine is in giving.
The strength of the feminine is in nurturing.

A mid-life crisis occurs most frequently in people who have been successful in life and are good at what they do. They get bored. They want more excitement; they want things to seem new and exciting like they did in their teens and twenties. There are several options. The red sports car (costs money), the mistress or new young wife (costs much more money), or they can begin to develop those parts of themselves that they have forgotten, ignored, or never knew they had in the first place. These are often described as the more circumspect, emotional, or spiritual parts of themselves. Or perhaps they might be considered the more feminine aspects. It can be risky because we do not want to appear weak or vulnerable. Our more feminine aspects are culturally suppressed, even in (or especially in) successful women. We have to be tough to succeed.

(b) ***How do we begin to break through this?***

To learn to give without fear of loss is the first step. Therein lies the strength of the masculine. To move away from the sense that people are taking from us, to where we are giving to our partners, children, and community. Without regard for reward or recompense.

To learn to love without fear of loss is the final step. This is beyond mere giving. This is a sense of commitment of life and energy and self beyond which we thought ourselves capable. Being present and active in the lives of others through thoughts, actions, and prayers. To fear loss is the beginning of the end in a relationship. It will destroy the relationship.

The sooner the masculine can let go of the feeling that they must be in charge, the sooner they will find happiness and peace. The sooner the feminine is allowed to follow her heart, the sooner peace will return to the world around her. We are speaking of the kind of revolution discussed in Henri Nouwen's book The Wounded Healer. Moving away from our classic roles and *Might makes right*. But how do we move away from a world based on *Might makes right* to a world based on love, nurturing, and sharing?

Give up power and control and just be… (Especially with your spouse). Share your feelings (not your thoughts). What are you feeling? Loneliness and isolation? Please share that. You will find a new intimacy that is healing for our souls. Lead by being led. Listen to those around you. Read. Follow the lead of others.

(c) ***But wait a minute! What about choosing the Depression/Early Death option?***

This is obviously marriage or any meaningful partnership. It seems that many of us who seem so angry have developed a particular negotiating style learned long ago that gets us into trouble. There are basically four positions from which to negotiate. Each participant starts in one corner (usually upper left or lower right) and the goal is to get to the upper right and (hopefully) avoid the lower left. But you must go through the middle to score.

I win / You lose **I win / You win**

On-going Negotiations

Separation or Divorce < < I lose / You lose **I lose / You win**

1. **I win / You lose**: My ideas are always the best, so we'll do it my way, OK? (Your significant other?)

2. **I lose / You win**: Ok, let's do it your way. It seems Ok with me, I think. I haven't really thought about what I would want to do anyway, since I never really do. (Is this you?)

3. **I lose / You lose**: Wait a minute, why am I always doing what s/he wants. It's not really fair. Well, I don't like it; so I'm not going to enjoy it, and neither will s/he!

4. **On-going Negotiations**: Wait a minute here. I want to tell you I am unhappy. I don't like this. No, I don't want a divorce; neither do I want us to separate. I just want to say how I feel. Why haven't I said anything before? Oh, I don't know. I guess I wanted everyone to be happy. But I'm not. No, I'm not mad at you. Well, maybe, sort of. Please, really. Can't we just talk about this without you getting all upset? Yes, you are upset. No, I don't want to talk about this tomorrow. Let's talk about it now. Where are you going? Can I take a walk with you? Please?

5. **I win / You win**: When the smoke settles and you choose to stay together despite the *Depression and Early Death* outcome (his/her depression, your early death) from having to continue to struggle together in compromise, only then can you figure out how to make the best of the situation.

The book Getting to Yes by Roger Fisher, William Ury, and Bruce Patton includes necessary skills for us to negotiate our way out of anger, resentment, and bitterness.

3 A Loaded Gun

Are women really superior to men in their ability to understand human interaction? Do they really just play us like instruments? Is it really necessary to lose every argument with your wife? Even when you win you lose (have you ever noticed that?). Or at least end up wishing we had lost because somehow it wasn't worth the price.

Masculine versus feminine: not the battle of the sexes but complementary components of the energy or spirit we call God? And the coming together of man and woman is somehow the manifestation of God (and new life if you are not careful). Then why do we feel like we lose something when we share ourselves with our wives? Like we have lost when in fact we have gained. Peace. But then we have also lost our edge.

There is a joke about how the only safe sex is sex with oneself. A female government medical spokesperson made the recommendation that young people masturbate before they go on a date to reduce the risk of inappropriate sex. She was fired, but a young patient of mine remarked, *Yeah, don't leave home with a loaded gun*.

Why does our sexual energy feel like a loaded gun? You take your chromium so you can feel like a young rodent again, only to get into trouble by telling racy jokes to people of the opposite sex. Do we leave the Garden of Eden because it is too darn peaceful there? We go looking for excitement and adventure.

(a) ***Breadth versus Depth of Relationships***

When men are young, the possibilities and options of life are as broad as the horizon. And we look everywhere. Then we meet the right girl, settle down and finally get married. Now we have the opportunity to develop a deep relationship with one person. Our option is equally wide as before, but in the vertical axis (up and down- depth of relationship) rather than the horizontal axis (a myriad of different relationships). Unfortunately, most men are vertically blind. We see left and right just fine (*Just look at all of the women out there!*) but when it comes to appreciating depth of relationship, we have trouble seeing up and down. All we see is a narrow way to go; the whole horizon has contracted to one woman.

A friend once remarked, *You only meet the right girl after you're married, and then you meet her over and over again*. Sure, you can go from transitional relationship to transitional relationship in serial monogamy (one mate at a time, but many over time). But whatever problems you don't work through with the previous, you will face again with the next. And you will face them, again and again and again.

So let's give up and begin to value depth of relationship. Maybe then we can re-enter the so-called Garden of Eden, a place of peace and tranquility (where nothing exciting ever happens?). Doesn't sound too good but then the alternatives sound even worse. So give it up already. Depth is the word of the day. Maybe we'll learn something (your wife doubts it but try to surprise her).

(b) ***Get It Together***

So where do we start? Go out for breakfast once a week and listen to her talk to you (and talk she will). You really don't have to say too much (the less the better at the beginning until you get more experience). Then begin to say little things that are important to you (but don't be surprised if she thinks they're stupid). Little things about what kind of car you like or what team you think will win this weekend. She will probably nod knowingly and then go on talking without getting mad at you. But you pick up and pay the bill (they like that, even if it is just $12).

After a year or two of that, you could consider something a little more risky. Something like giving her an upper back massage. No, this is not like college where you are just doing this with the hope of making it to second base. This is not about sex. It is about physical contact and being connected physically. If she doesn't like that, just go for a walk but holding hands. Yes, reach out and take her hand! What are you waiting for; you're not in Junior High any more.

Help around the house. Empty the dishwasher (good back flexion and extension exercise as you place the glasses and plates in the cupboard). Take the laundry to the laundry room (aerobic exercise- but don't do the laundry unless you know what you are doing- but do check the washer hoses while you are there to make sure they are not corroding or developing a bubble ready to burst).

Would you consider vacuuming? Maybe just once for the shock value? How about going to the grocery store? Ask for a list or just get what you think would be healthy to eat (see *The Staying Healthy Handout* in Appendix 1). All of this is not compromising your manhood, but in fact giving you the latitude to truly be yourself without others defining who you are or should be. Be yourself and allow others to be themselves. Give the gift of life (donate blood) and be the gift of life (be yourself and allow others to be themselves).

(c) ***Marriage and the Family***

Let's get back to marriage and the family (and sex). So you have walked around the neighborhood holding hands (countless times? Are the neighbors talking yet?). What's next? The symphony? The Opera? A concert at the Junior High School? I don't think so (Been there, done that).

My wife came up to me recently, looked me in the eye and said *Sometimes I wonder why we are still together*. I didn't know what to say so I just stood there looking serious but not saying anything. She continued *But then I realize that when it comes to the real core values in life, we agree*. (Although we seem to disagree on almost everything else?). Thank God for small favors. I think she was talking about the creation of family and home. I didn't ask at the time because I didn't want to look stupid (since I seemed to be doing all right keeping my mouth shut).

The creation of family and home. Women seem to like that. But they also seem to like to share that with someone else who cares about family and home. I personally like hanging outside doing projects or building fires to cook dinner or just building stuff. But to have the privilege of sharing yourself with your own flesh and blood (or other kids or grandkids), I would not miss that for the world. I guess that is what she meant.

Sex: the creation of flesh and blood. Is that what men and women have in common? Women want the creation of family and home; men want to discharge that loaded gun. And both seem willing to put up with terrible inconvenience to get what they want; it may mean more than anything else does in the world. So put up with the inconveniences without looking elsewhere (seriously- an occasional flirt is ok and healthy?). The grass may appear greener from where you are, but don't believe your eyes. Value the wisdom in your wife and in you. And give the gift of life.

(d) ***Anger, Resentment and Bitterness***

It may be that much of the anger, resentment and bitterness in men originate in this conflict of horizontal versus vertical horizons. Many men feel trapped by the social constraints of mating with one mate. This may not be the natural state of man. In most other animal species, the male attempts to mate with as many females as they can for the preservation of the species in the survival of the fittest. The strongest males fight off the weaker competitors and win the female. So where does that put Homo Sapiens? Is there a part of us that strives to continue that biology?

4 Choosing Spiritual Death

(a) *Eating sugar is death*

(But a little death is OK?) Eating starch is just like eating sugar.

- Like driving your car sixty miles per hour in first gear.
- Like leaving a dozen roses in the sun with no water.
- Like the slow motion version of pouring gas on your body and lighting a match.

Does this look familiar? It is a quote from early in Volume 1. The consumption of sugar and starch promotes weight gain, diabetes, heart disease, cancer, depression, and early death (see The Staying Healthy Handout in Appendix 1 for more information).

(b) *The consumption of lust, rage and greed is death- Spiritual death*

(But a little death is OK?)

Consuming sugar promotes a high insulin level, which promotes aging. Consuming lust, rage and greed promote the distraction of life away from that inner part of us that connects us all. I have successfully (for the most part) eliminated sugar and starch from my diet. I can stand in the midst of pastries, donuts, mashed potatoes and toasted bagels and not be distracted from my life.

But as for lust, rage and greed. Ha! My mind and strength scatter to the wind and I am helpless. Because up to now I have refused to consider letting go of these, because I enjoy them. In some weird way. They give me the distraction I long for. To distract my mind from my obligations and responsibilities.

I am perfectly familiar with anger. I choose anger over understanding. Anger allows me to stand back, turn, and walk away. Just like a man. Anger allows me to add distance to my relationships. I have conditional love, see? As I walk away. Ha! Stupid me! When will I ever learn these people want and need me more than they need my toughness and discipline?

4 A Simple Healthy Life

My wife recently informed me she is now the same age as my mother was when she first met her. My mother then was more than twice my age. Now I am 2/3 of her age (i.e. I am getting older faster than she is?). I seem to be rapidly catching up. And am I having fun yet? I'm not sure, but really. The treadmill keeps getting faster and steeper.

A patient of mine named Jack lent me the book *My Ishmael*, a book about saving the world. It was very depressing to me. I knew the premise was true and one I had dreamed of following as a young person, but instead I joined the workforce. Now I want that simple healthy

life back. But how? Three kids in private school, travel soccer teams, musical theatre, etc, etc, etc. There are 10,000 options. We don't have problems, only opportunities. Yea, right. But I must continue on the straight and narrow (or truly die in spirit if I choose to abandon my family and friends).

How do we recreate the tribal community which gave us security from birth to death, protection, a sense of belonging, an opportunity to serve, responsibilities to each other, and if one person was hungry, it was because all of us were hungry. What have we gained from civilization? Automobiles, Cellular phones, DVDs, MRI scans, cardiac surgery, bone marrow transplants, hypertension, diabetes, depression, nursing homes, and an incredible sense of isolation, insecurity and loneliness. Fear of the future and that fear can be the origin of illness.

The origins of illness begin in our genetic predisposition, but are often greatly affected by our environment. Foods of Famine versus Fruits of Plenty (the Mediterranean Hunter-Gatherer Diet), toxic exposures, infections, and finally our attitudes toward issues of survival, sexuality, power, love, expression, vision, and spirituality.

Hell has three doors:
Lust, Rage and Greed

The more I examine my life, the more I realize many if not most of my thoughts originate from one of these three:

Lust versus Love
Rage versus Love
Greed versus Love

But not Hell versus God? Since God is Love, the faith community is a manifestation of God. If you are looking for God, look to your faith community (as dysfunctional as it may be, and probably is; they all are). But where is that? It is no longer our tribe. Families are the core now but they are too small to provide what the community once provided. The Kibbutz is a good model. So is the Amish community. But how do we begin to do this where we are. And now.

'Tis a gift to be simple
'Tis a gift to be free
'Tis a gift to come down to where we want to be

With this as our fight song we must proceed forth into the battle, the battle against the taking advantage of our fellow man, against lust, rage and greed. But to do battle as did Mother Theresa, Martin Luther King, Jr., Ghandi, St. Francis of Assisi, and Jesus. In our own quiet way, making a commitment to each other in community, living simply together. And sharing what we have freely with others.

Can we do this? Does this mean giving up Harvard? Professional school? The Good Life? When you have it all, what do you have? A sense of isolation from others who have less. Because if you share with others, you will no longer have it all. But in fact, you can never have it all. There is always more to need. I need a faster computer, a faster car, a faster husband, a faster church, etc.

5 Sex, Spirituality, and Meaning

Affirmations I repeat while I meditate:

I am whole
The Earth supports me
I am connected to my community, my family and myself

Why do I say these to myself? Because I do not always believe them. Sometimes I feel the world walks over me even while it is chewing me up and spitting me out, and I am pretty much alone in this world, struggling to survive. But I know and believe most of the time that I am whole, that the earth does and will support me, and that I am an integral part of my community.

(a) *What is the normal frequency of sex?*

There are 3 men speaking together. The first man pulls out his wallet to show he has six condoms, one for each day of the week, except Sunday. The second man pulls out his wallet to show he has eight condoms, one for each day of the week, plus two for Sunday. So the third man takes out his wallet to show he has twelve condoms, one for January, one for February....

Are you a twice a week type, an every night type, a special occasion type, or what? People who are angry about life, feeling unsupported or being used, frequently do not want to have sex with their partner. They withhold physical affection (at least partly) out of the untruths to which we adhere:

I am not whole
The world does not support me
I am isolated from my community, my partner and myself.

Where and when do we begin to lose track of ourselves as the center of the universe that we were as newborns, making known our every whim and will? How can we begin to again ask for what WE need and desire? All of us had healthy sex drives as infants, toddlers, and even as young adults. Most of us still do, but somehow it is not directed towards our partners. We fantasize (or more) about office mates, friend's spouses, people at church, people on the street or bus or airplane. We look to strangers out of our inability to face ourselves and our true needs.

I am being ripped off by life? I am NOT giving myself to you, because you are part of what took my life from me. What about MY dream and desires? WHEN will I be allowed to follow those?

Heck, what ARE my dreams and desires? Do they have any bearing or substance in my being? Why is it I can really want to have sex with a stranger who I cannot have sex with, rather than my partner who is lying naked next to me? If I could answer that question...

(b) ***Stop smiling and saying everything's fine when it is not***

Could it be true that women who deny their sexuality develop more ovarian cancer, and men who deny their sexuality develop more prostate cancer? Does that suppressed energy have to be expressed as some kind of growth, either physical, emotional, or spiritual? Express your sexuality, the growth you experience may be lifesaving. Is it also acceptable to have spiritual sexuality and not necessarily physical, as many spiritual leaders have done. To be complete does not require physical sex, although many of us chose that.

So stop smiling and ask for something, anything. If you get it, you may feel more like giving.

Or you could just try giving (seducing your partner) and see what happens. Since all of life is a gift, who are we to try to hold onto all of it like it was ours, like we created it.

So, repeat after me,

I am a sexual being.
I enjoy sexual intercourse.

Intimacy heals.
Isolation, jealousy, and anger kill (our bodies and our spirits).
Let go of control and seek out intimacy at all costs.
At whatever it costs. Trust. It is worth it.

(c) ***We All Go To Heaven***

The Hebrew I AM or Yahweh (some people refer to God) is everything, from the best to the worst, from the most saintly to the most evil. We all go to heaven. We are all part of I AM and we all return to I AM. Don't be good so you can go to heaven. You're going there anyway. Think of the worst, most destructive person in history and they too are but a manifestation of I AM and returned at their death to I AM. Sure, maybe their manifestation of God wasn't so good, but could good exist without evil, life without death, light without darkness? How would you know warmth if you had never been cold?

(d) ***Let Go of Guilt***

The whole point of this is to let go of guilt.
Do not do things from a feeling of guilt, which kills your spirit.
Do things from love

Some religious traditions state we must give at least 1/10 of what we receive back to God. Will God love us more if we give more of our money or less if we give none? No.

Giving makes you feel better (if you give from love).
Forgiving makes you feel better.
Loving makes you feel better.

Anger and isolation are extremely unhealthy. What is incredible is that giving, forgiving, and loving are very selfish acts. You receive much more benefit in your life and health than the other person. Anger and isolation kill (from heart disease, CHF, cancer, homicide, and suicide). What does it profit a man to gain the whole world but to lose his own soul (and life, health, and a sense of peace)? Do not be good. Guilt kills. Be yourself. Your honest manifestation of I AM. You'll thank yourself (and God?).

(e) ***What is Meditation?***

To face without fear the devils inside my head. To listen quietly to the chaos which is me. To let go of control and just be. To be who I AM. To allow myself to flourish and not faint (see Isaiah 40:28 on page 75).

To climb ever higher in my understanding of life, of who I Am, of what I am made of, and of what it is to care for others and myself. Only then can I begin to let others be themselves, to coax and encourage their best, their own manifestations of I AM. Where do I find this knowledge but within me: I already know; I only need to remember. I (as a baby) was once the center of the universe. I AM still. I only need to remember. We all need to remember. How do we become so lost? How do we so badly lose our way?

Why do we stop listening to ourselves? Why do we not trust our instincts and ourselves? Let go of what others say that you must do. Of what do you dream? Is it worth doing? (What does that mean? If you dream of chasing some young thing, then it may NOT be worth doing). Listen again to your heart and test what you hear. Does it include sharing yourself with others? Does it allow others to feel *the Earth supports me?* Might it occasionally make people remark that meeting you was a gift from their God?

Does that give you a clue of where your place is? Listen and you will hear. Follow that voice within you. It is the place of healing for you and others. Reach out, to yourself and others. Forgive your slowness. We have time to accomplish this. Be patient.

(f) ***Another Story***

We are all kinetic engines, changing food, drink, and thoughts into kinetic energy, energy that moves things. But which drive shaft do we connect our flywheel to? If we connect to nothing, we sit there chug-a-whump, chug-a-whump, chug-a-whump all day long. So we look for something to which to connect. We find a widget factory, so we hook ourselves up and chug-a-whump, chug-a-whump, chug-a-whump, we produce widgets. But so what?

I want to connect my flywheel to something that is meaningful. I don't want to produce widgets. I want to create something good such as art, music, scientific discoveries, anything to touch those kinetic engines around me. But are we more that just kinetic engines producing energy and movement? People speak of having a soul in their kinetic engine. What does that mean? Think of the engine in our car; it converts fuel into kinetic energy and moves you places. Does it have a soul? I don't think so, yet it performs a similar function.

Jaguars and Pintos (the animals, not the cars) do the some thing. They turn meat or grass into kinetic energy. Do they have souls?

Hitler and Mother Theresa did the same thing turning fuel into kinetic energy. They accomplished things: horrible things or wonderful things. Both were kinetic engines hooked to different wagons, with different souls. I guess that's the difference. What wagon has my soul chosen? What will my soul have accomplished when this engine wears out and is discarded? I can choose: widgets, power, or love.

And if we could connect our engines in a coordinated fashion to the same drive shaft, we could be incredibly powerful in producing whatever it is we produce. I think that is what they call the GREAT I AM- all of us connected to the same wagon pulling for love.

The Wounded Healer:

We are all healers. But when we want a new car, successful children, an affair, or to become rich, we wish we were somewhere else. We become distracted from who we are and where we are. We can become angry, resentful, jealous or bitter. We try to escape, through work, play, alcohol, eating, entertainment, whatever. But through this we lose our ability to heal.

We are healers when we are present with those around us, when we are connected to those around us, when we feel and share the suffering of those around us. But from our understanding of our own suffering we can help them approach the origins of their suffering and help them move away from it also. We can share our strength with them, and help them find their strength.

George Steele MD

I am whole.
The Earth supports me.
I am connected to my community, my family and myself

The God of the Hebrews, the Great I AM.
We are all manifestations of the Great I AM.

Who am I NOT to share the I AM within me? I make excuses. I'm too shy.
I'm afraid I will irritate, or intimidate, or seduce?

When will I let go of fear and share that which I AM? We manifest the Great I AM.
If I do not share, then I AM (is) dead?

Love, not fear.

I AM (is) not shy.
I AM (is) not afraid.
I AM need not irritate, intimidate, or seduce.
I AM (is) love.

George Steele MD

4

FURTHER THOUGHTS

1 Searching for an Effective Spiritual Placebo

I am a very practical person. I look for things that work and I hold onto them. My patients in my medical practice have taught me a lot in the last few years. Here I will list the effective placebos I have found. I refer to them as placebos because most of them have not been proven in randomized, placebo controlled clinical trials. But they do seem to work, and in some cases work extremely effectively. This is the outcome I am looking for. I believe in evidence-based medicine, but where the evidence is lacking, do what works best (as long as you do no harm). But if the situation is not improving, other approaches must be considered.

(a) For Physical Complaints:

For the aches and pains of getting older: MSM (methylsulfonylmethane: 3,000mg in the morning). While taking this I am able to play squash for 2.5 hours with no shoulder or knee pain (I used to live on ibuprofen when I exercised because of my knees). I have had two patients threatened to have their permanent disability payments cancelled because their physical problems have been reduced to the point of non-disability. Most patients say they just feel better, especially in the knees. When people stop this, they often also feel worse. Try it.

For allergies and asthma: Eliminate milk, wheat, peanuts, chocolate, wine, orange juice, and FDA yellow dye #5. Some of the large proteins we consume in food and drink stimulate our immune system causing us to react to dust, mold, mildew, animal dander and pollen. Eliminating certain foods from our diets can eliminate the reaction. It is hard to believe that inhaler use could be optional, but it is. I have had innumerable patients have even their life-long asthma resolve by discontinuing certain foods, particularly casein in milk products, sulfites in wine, wine vinegar and balsamic vinegar, and FDA yellow dye #5 (tartrazine).

For shoulder, neck and back pain: Dr. Sarno's book *Healing Back Pain* has been a first step to patients realizing that their bodies talk to them about stress. Tables 2-1 and 2-2 in Chapter 2 present how our symptoms and diseases are often associated with underlying issues.

(b) For Mental/Emotional Complaints:

For dysthymia or depression: Supplementation with chromium (400-600mcg per day) has been shown to improve depression scores in people with chronic low grade depression which reversed when taken off in a placebo controlled trial at UNC-Chapel Hill School of Medicine. Chromium is also helpful when added to prescribed antidepressants such as Zoloft.

For anxiety/stress/fatigue: Reducing sugar, starch and allergenic foods has been very helpful. Be it the Yeast Connection, Hypoglycemia or otherwise, people feel much better.

Marital discord: Choosing the Depression/Early Death Option section (see page 50) has been helpful. This looks at our negotiating skills and points out the futility of always being a nice guy or gal. It is deadly in the end. Choosing the different (and difficult) stance of standing up for what you want and/or need is healing in the long run, although painful and potentially dangerous to the relationship in the short run (but worth it in the end).

Sexual dysfunction: Most of us are no longer sixteen years old and no longer focused on only one thing. Distraction is the biggest cause of erectile dysfunction and anorgasmia (lack of sexual orgasm). Resentment, guilt, isolation, or performance anxiety distracts us. The little blue pill works remarkably well. But it is preventing us from communication about the true underlying issues, which must be addressed for the long-term health of the relationship. I encourage you to talk and try to avoid Viagra, Levitra and Cialis. Learn how to talk non-aggressively with your partner.

(c) For Spiritual Complaints:

What in the world is a spiritual complaint? Suffering. Doc, I've got suffering. My neck hurts. I have pressure in my chest. My stomach aches. Heartburn is eating me up. I have spasms in my back. I'm tired all the time. I can't sleep. My manhood is gone. I'm depressed. I hate my job. Life is meaningless. Man, I just don't give a damn. (First I try to make sure nothing is physically wrong, and then….)

(d) How can we approach these patients and their suffering?

You listen. Please read on….

Is suffering the normal state of Man? Is the nicer you are the more you suffer? Do truly good people often feel bad because they are not living up their potential? Do not-so-good people feel ok most of the time because they are meeting their potential? And do truly Bad people feel

terrific because they are doing what they do best? I think so. But I am not advocating being one of the bad people.

We all suffer to some extent. We all have some malaise in our body and our mind. We have to recognize and acknowledge the presence of this suffering. Listen to your body. Listen to your neck, your back, your stomach, and your sexual organs. They are all screaming at you that something is wrong. Something is wrong with your approach to life. And if you don't listen, this something might get the better of you.

After we recognize and acknowledge our suffering, we need to look deeply into it to see how it came to be. We need to recognize and identify the spiritual and material reasons that are causing us to suffer. The table of symptoms with their possible underlying issues in the Healing chapter is helpful in giving some suggestions, but you must also think about others.

We must recognize that healing is possible. Healing is always possible. Perhaps not physical healing, but emotional, mental, and spiritual healing.

(e) We need to change our approach if we are going to heal.

How we view things, express ourselves, what we concentrate on, and where we are going, perhaps even what we do for a living if that interferes with healing. We need to take risks and try new roads looking for our own truths.

Now look back at the list of medical complaints with their associated underlying issues in the Healing section. This is a good place to start. Let's say I recognize my shoulder and neck pain as a manifestation of my anger, resentment or bitterness, but I seem incapable of doing anything about it beyond screaming at someone, raising my blood pressure, constricting my coronary arteries, and consuming alcohol. Or that I feel very lonely but cannot let down my guard in relationships out of fear of being hurt or sucked dry of my energy and life. I must stay protected. I am trapped by my own responses to life. How can I let go of my need to control myself, others, and the situations I find myself in?

The appendices in this volume discuss meditation and affirmations as a tool to overcome and solve these problems. But….

(f) Beyond Meditation

I don't think meditation will really solve anything by itself. It is merely a tool. A tool to slow our mind so we have a chance to think and to feel. To be aware of who we are, where we are, and what we are doing. Read the following four rules and see if any of this makes sense to you:

We all suffer to some extent. We have some malaise in our body and our mind. We have to recognize and acknowledge the presence of this suffering.

After we recognize and acknowledge our suffering, we need to look deeply into it to see how it came to be. We need to recognize and identify the spiritual and material origins of our suffering.

We must recognize that healing is possible.

We need to change our approach if we are going to heal. How we view things, express ourselves, what we concentrate on, and where we are going, perhaps even what we do for a living if that interferes with healing.

If this makes sense to you, you are ready to listen to the spirit inside of you. To the Buddha within you. The above passages are the Four Noble Truths of Buddhism from The Heart of Buddha's Teaching by Thich Nhat Hanh. Buddhism is not a religion. Buddha was not a god. He was a person. He and many others are simply looking for their truth and sharing their glimpses of truth with others.

I have suffering. I am suffering. I often feel incredible loneliness even in the midst of people. We are all alone, from the moment we are born to the moment of our death. That is what it is to be human. We all share this, even if we are married or have significant partners. Even if we are celibate. We all suffer this same aloneness.

It is not that we never see beauty or have moments of happiness and joy. But we are all weighed down by the parts of us, which are negative and destructive. These parts disconnect us from the world and from the ones we love. These parts harm those around us, harm those we love. These negative parts can be alcohol, food, lust, money, power, possessions, or other outcomes we desire at whatever cost.

As Sri Krishna (The God of Hinduism) said in The Song of God: Bhagavad-Gita:

Hell has three doors:
Lust, rage, and greed.
These lead to man's ruin.
Therefore he must avoid them all.

We all must work together:

The interconnectedness of life.
That everything I do affects those around me.

When I disconnect myself from others with anything from the list above, I am harming more than just myself.

A flower is not a flower
It is made only of non-flower elements
Sunshine, clouds, time, space, earth, minerals, gardeners,
And so on.
A true flower contains the whole universe.
If we return any one of these non-flower elements to its source,
There will be no flower.
That is why we can say,
A rose is not a rose.
That is why it is an authentic rose.
Thich Nhat Hahn: Living Buddha, Living Christ

When you realize the true interconnectedness of all things, your perception of reality changes. If you poison the water of rivers, you poison all things, including us, because we are from water. If you pollute the air, you pollute all things, including us, because we are from air. If you harm anything you harm all things, because we are all interconnected.

When I eat meat
I have caused an animal to die.
I have caused another person to have to take the life of an animal.
The repeated taking of life may be preventing that person from appreciating the value of all life.
He will pass this lack of appreciation of all life onto his children,
And his grandchildren
And so on.
Kind of makes you want to eat vegetables.
(But I still eat meat…)

(g) The Three Kinds of Devotion

If you are still reading this, I would suggest that you already have a good sense of your own spiritual journey, your own search for God and meaning. It appears there are as many paths to God as there are people. One thing that has helped me understand and respect those people around me who seem to be on a different path is that all roads lead to Rome, if Rome is, in fact, where you are trying to go. All spiritual paths lead to God. But we must each find our path and follow it.

The three kinds of devotion (or paths to God) are as follows:

Devotion to God
Devotion to money and power
Devotion to ancestors

All of these can be correct and appropriate paths according to the Bhagavad-Gita, if your ultimate goal is a spiritual one. A friend explained this as follows: If you want to cross the street, you can cross the street. Or you can turn 180 degrees and walk the other way and you will eventually get there 24,000 miles later (and probably learn a lot in the process). I guess this is why I have read so widely and struggled with what I consider my truth. It may not be right for others but it is beginning to make sense to me. What I am trying to do is to solve a problem. If it works, I will share it with others.

The Reverend Lewis Mills was dying of the most aggressive prostate cancer his physicians had ever seen. As his primary physician and friend, I was making housecalls to check on him. Hospice was doing their usual wonderful work. I would listen to the little voice in my head as to when I needed to see Lew. It was amazing because that little voice always seemed to know the right time. Several of my visits were during his few conscious hours of his last weeks of life. It seemed that every time he was awake, I was there. He was and is a very strong spirit. My wish for myself is that I would listen more to that little voice. It has volumes to tell us.

5

POETRY
(AND EVEN FURTHER THOUGHTS)

Making up my mind

Images in my mind
Of loneliness
Of aloneness
Are but my imagination
What appears to be separate is but one

I myself lack nothing of wholeness
I am but part of the whole
However fractured I may feel

I am that I am that I am
Each part of The Great I Am
Neither male or female
But spirit embodied
Both male and female
In the joy of life
George Steele MD

The Stages of Life (and Sex)

Dependence (is less than) **Independence** (which is still less than) **Interdependence**

What allows me to have sex with my wife?
The freedom to give
To acknowledge my interdependence with her
For her to be happy I must be happy
For me to be happy she must be happy
To share with her is to share with myself
And my family

Do not mistake this for dependence or weakness
It is essential to make yourself vulnerable
Because in doing so you achieve freedom
Freedom from fear
Freedom from being alone

For he who seeks to protect his life shall lose it
But he who seeks to lose his life within his community and relationships
Will gain everlasting life

The answer to anger/resentment/bitterness
What was the question?
George Steele MD

Living hell

Fear and self-destruction
Greed and envy
Living hell
Already

When people honk their horn they are sharing their living hell with those around them.
Don't get angry with them, pray for them.
Try to pull them back from their living hell.

Been there
(Honking)

Done that
(Needed help escaping from my own hell)

Life can be a cooperative effort excluding no one except those who exclude themselves.
Why do we exclude ourselves?
Why, when we are the most needy, do we push others away?
Why do we choose to be psychic masochists?

George Steele MD

Definition: Psychic masochist

We are trained not to display anger to others. We are punished when we do. But no one punishes us when we vent that anger and frustration on ourselves by smoking, drinking, risky behavior, drugs…

How can we ask for what we need, when it has been so long since we have allowed ourselves to need anything? *No, I'm ok. Everything's fine, thanks.* Yea, right.

Say to yourself: *I have meaning in my life.* Now let's find that meaning. What do you do that could be seen as helping others?

Doing a good job for your supervisor? (She won't care!)
Doing something nice for your ne'er-do-well spouse? (They don't deserve it!)
Giving money away to the Salvation Army? (They'll just waste it on more junk mailings to me!)

It doesn't matter if anyone cares or notices, You will, and it will begin to free you from your anger, resentment and bitterness. The gift of my tight neck and shoulder muscles is a continuous monitor of my anger, my health, and my future (anger and hostility promote heart disease and cancer).

Exercise helps. Exercise where you listen to your breathing and not the TV or the Walkman. Contact your inner self through exercise. Why are some people addicted to exercise? Because it is a reliable way to find peace in this chaotic world (yoga and meditation for you more Eastern types). And although it may seem to last only as long as I am running, it is still much better (light years better) than the alternative of constant living in the chaos without escape or parole.

Stages of life

In our mother's womb- safe and warm.
Birth- Cold! What is this breathing thing?
Infancy- I am the center of the universe, but struggle to survive and have my needs met.
Toddler- learning limits, taking risks, acquiring new skills.
Childhood- discovering myself.
Preteen- moving into society, discovering oneself in community.
Teenager- groupie.
Preadult- future paths, how will I support myself? What will I do?
Developing path and career.
Finding/creating community and family of my own.
Adjusting to midlife- *This is it? Is this all there is*?
    Same job.
    Same partner.
    Same responsibilities.
    Marriage counseling versus transitional relationships.

Possible changes in job, partner, God?
    But no, you stick with it.

Look back at the toddler, childhood and preteen stages.
    We were capable of such incredible growth. What has happened to us?
    We have learned our limits, but have forgotten how to take risks and acquire new skills.
    We need to continue to discover ourselves in community.
    We need to recognize the interconnectedness of our lives with those around us and those we have met, and even those we have not met.

Peace and happiness come from within, so find them already.

Goals:
    Next one month: ask for some time off to be creative, to draw, to write, to paint, to teach, to travel, to sculpt, to find new work, whatever.
    Next one year: find outlet for your creativity; teach kids art, find publisher, share artwork.
    Next five years: can you make more of a vocation out of your avocation?
    Next twenty-five years: giving back to the greater community; avocation becomes vocation.

A great gift to others is to find peace and satisfaction in what you are (already) doing, be it waiting tables, fixing cars, litigating, teaching, vacationing, carpooling or just hanging around. Do a great job, because you are worth it.

The fruit of silence is prayer.
The fruit of prayer is faith.
The fruit of faith is love.
The fruit of love is service.
The fruit of service is peace.
Mother Theresa

What stifles our personal power to create?
Bosses, teachers, spouses, parents, friends, ourselves
Our need for things and, therefore, money
When will we let go of things and hold on to that which will last?
That which is eternal, not temporal
Not things, but each other
The community
God?
George Steele MD

But he who says he knows God does not know God, because God is unknowable
Anonymous

The Invitation

It doesn't interest me what you do for a living.

I want to know what you ache for, and if you dare to dream of meeting your heart's longing.

It doesn't interest me how old you are.

I want to know if you will risk looking like a fool for love, for your dreams, for the adventure of being alive.

It doesn't interest me what planets are squaring with your moon.

I want to know if you have touched the center of your sorrow, if you have been opened by life's betrayals or have become shriveled and closed from fear of further pain! I want to know if you can sit with pain, mine or your own, without moving to hide it or fade it or fix it. I want to know if you can be with joy, mine or your own, if you can dance with wildness and let the ecstasy fill you to the tips of your fingers and toes without cautioning you to be careful, be realistic, or to remember the limitations of being human.

It doesn't interest me if the story you're telling is true.

I want to know if you can disappoint another to be true to yourself; if you can bear the accusation of betrayal and not betray your own soul. I want to know if you can be faithful and, therefore, be trustworthy. I want to know if you can see beauty even when it is not pretty every day, and if you can live with failure, yours and mine, and still stand on the edge of a lake and shout to the silver of the moon, YES!

It doesn't interest me to know where you live or how much money you have.

I want to know if you can get up after a night of grief and despair, weary and bruised to the bone, and do what needs to be done for the children.

It doesn't interest me who you are or how you came to be here.

I want to know if you will stand in the center of the fire with me and not shrink back.

It doesn't interest me where or what or with whom you have studied.

I want to know what sustains you from the inside when all else falls away. I want to know if you can be alone with yourself, and if you truly like the company you keep in the empty moments.

Credited to Iriah Mountain Dreamer, Indian Elder

There was once a fellow

There was once a fellow from the Midwest whose job it was to coordinate travel arrangements to Stockholm the year Mother Theresa won the Nobel Prize for Peace. So he calls Calcutta looking for Mother Theresa's phone number. After numerous failed attempts, a woman answers the phone and agrees, *Yes, this is Mother Theresa*. So our fellow begins to explain what he needs to do, but Mother Theresa interrupts him. *Young man, I have but one question for you. Do you pray?* And she went on for the next several minutes in this same vein, encouraging our fellow in the importance of daily prayer. Finally when she was done he said he wondered if he could ask a few questions about arranging her trip. She said yes, but hold for a second. And she put someone else on the phone.

The writer and Catholic Priest Henri Nouwen had a similar experience. During his meeting with Mother Theresa he was explaining how difficult it was to meet all of his obligations to life which included writing, leading a religious community, maintaining relationships with family and friends, and helping the greater church organization. He was obviously very busy and very important. He went on for several minutes while Mother Theresa was looking him in the eyes and nodding her head in agreement. When he finally finished she responded, *Henri, if you will spend an hour a day in prayer, everything else will take care of itself*. Henri Nouwen thanked Mother Theresa, stood up and left. He was obviously done (cooked?), and there were many others who needed to speak with her. And he knew she was right. Simple, but right.

A priest told a friend with cancer (who is also a priest) that he would pray for him. The friend immediately answered, *No, please, don't do that! Prayer can be so negative. Instead, think positive thoughts about me.*

So what is prayer? The thinking of positive thoughts? Let us return to Mother Theresa's poem on page 72.

Faith in the positive power and energy within others and myself. Leading to love for all living things. Yea, right. So there I am at work, ready to scream and walk away from all of these frustrations. The paperwork, having to seemingly do everything two or three times, the inefficient systems, the patients who just don't seem to even want to get better. What am I doing here anyway? Is this what I went to medical school for?

But then I pull out Chapter 1 of this book. I review the issues of power, love and expression. Then I turn the page to the affirmations for power, love and expression. And I repeat those to myself with my eyes closed sitting in my office. I relax. I can relax (surprise). I can begin to let go of my anger and resentment (if at least for a moment). And get back to my work, not with a sense of resentment and hopelessness, but with a sense of peace.

The Hospital Medical Service

I was taking over responsibility for the inpatient medical service on 12 Founders at HUP (the Hospital of the University of Pennsylvania). There was a patient who had already been there for two months and I was told that I would never get her out of the hospital. She had severe lung diseases and terrible stomach pains. She had had all of the tests and nothing was abnormal, but she still had severe stomach pains. The doctors had tried to send her home one month earlier, but she had returned immediately with severe shortness of breath and worsening pain. I went in to her hospital room to see her. We spoke of many things, including her family (two alcoholic sons at home with her) and her fears about her health. I explained that often the bowel goes into spasm with stress (spastic colon) and the pain can be so severe you can think you are dying. We talked about the stress in her life. She was Catholic. I had recently been struggling with issues in teaching the sixth grade Sunday school. I had a reprint of Isaiah 40: 28-31 in my backpack. The quote is as follows:

Hast thou not known? Hast thou not heard, that the everlasting God,
the Lord, the Creator of the ends of the earth, fainteth not, neither is weary?
There is no searching of his understanding.
He giveth power to the faint; and to them that have no might he increaseth strength.
Even the youths shall faint and be weary, and the young men shall utterly fall:

But they that wait upon the Lord shall renew their strength;
they shall mount up with wings as eagles; they shall run, and not be weary;
and they shall walk, and not faint.

I left this with her. When I walked out of the room, the nurse looked at me with a surprised look. She had assumed by the conversation (parts of which she had overheard while taking care of the patient in the next bed) that I was a priest. I said I was the new attending physician on the medical service.

Later the nurse told me that from that moment the patient was a new person. She wanted to go to physical therapy. She wanted to get out of bed. She did not complain. Two days later she went home (on the third day?). She was worried she would not have the strength to get up her front steps. I told her to sit on each step and push up to the next. She went home to care for her sons. She did not need to come back to the hospital. She had the spiritual strength to get better. All she needed was someone to remind her.

One of the residents had a difficult patient who had been refusing to go home. He tried bringing up the more spiritual side of life and illness with the patient (in a sincere way, using his own religious background). The patient (who needed to go home) went home. The smile on the resident's face was glowing.

I overheard a priest in the hospital speaking to the patient in the next bed. The priest was there to have communion with him. When the patient admitted he had not been to church in some time, the priest told the patient that they could not have communion but instead would have a prayer. Why not share a meal with someone who so obviously needs it? Maybe it would help. It couldn't hurt.

I agree that all religious traditions can be very negative at times, instilling guilt and a sense of resignation. But there is also the potential of discovering great strength and peace in the face of much suffering.

The tincture of God's love is extremely strong.
Randy Woods, Former Head of Middle School, Episcopal Academy.

I cannot change the world; I can only change my response to it. If the world decides to change based on my response, so be it.

We are the hands of God, the eyes of God, the voices of God.
We have the power to crucify our neighbors (put her down),
or we have the power to resurrect them (buoy him up).
The choice is hell or heaven,
here and now.
Reverend Lewis Mills

Look again at the poem below by Mother Theresa. Silence to prayer to faith to love to service to peace. So simple. If I end with a sense of peace, then the silence must have led to prayer. But don't pray for me. Think with positive thoughts for yourself, others, and me. Thanks.

The fruit of silence is prayer.
The fruit of prayer is faith.
The fruit of faith is love.
The fruit of love is service.
The fruit of service is peace.
Mother Theresa

6

THE ENNEAGRAM SYSTEM:
THE NINE WAYS OF RESPONDING TO STRESS

1 Unsuccessful in changing the way you live and eat?

Is the Mediterranean Hunter-Gatherer diet taking away the best things in your life? What is holding you back from feeling terrific?

(a) ***Your Attitude*** *(And possibly your situation)*

Your attitude can overcome a bad situation, or lead to changes in your situation. Our attitudes are directly related to how we respond to stress. In the 13th Century the Trappist Monks stole some of the ideas that the Sufis had put together in the 9th Century about personality types and our response to stress. The Sufis had based their seven personality types on the Seven Deadly Sins. The Trappist Monks added two more: fear and deceit. Each of us has a most comfortable way of dealing with stress. We could respond any of the nine ways, but we tend to fall into the trap of responding the same way no matter what the stimulus or outcome.

(b) ***Which is your predominant response to stress?***

(Pick only one choice that seems to fit the best)

I feel disappointed with others and myself for not working hard enough; I feel unappreciated and burdened by too much responsibility (Type One).

I become very sensitive to criticism; I am afraid I am not loving enough; I become upset when people ignore me; I feel drained from overdoing for others (Type Two).

I feel I am not perceived as successful; other people are doing better than I am; I sometimes pretend I am doing better than I am to impress others, I get exhausted from always being on (Type Three).

I can feel self-hatred and shame; I feel I don't deserve to be loved; I feel hurt or attacked when someone misunderstands me; I fear being abandoned; I long for what I don't have (Type Four).

I often feel intruded upon; I feel pressured to be with people when I don't want to be; I avoid interpersonal conflict by withdrawing; when I am uncomfortable I often seem aloof, distant, or arrogant (Type Five).

I become anxious and hyper-vigilant; I exhaust myself looking for danger and worrying; I wish I had a rule book so I could do everything right; I procrastinate for fear of failure; I become too critical of myself when I don't live up to my own expectations (Type Six).

I feel like people are trying to change me; I feel confined in this one-on-one relationship; I feel I don't have time to complete everything I want to do; I can get lost in plans or fantasies (Type Seven).

I can become angry, belligerent and hostile; I seize control to prevent being controlled; I am impatient with other's incompetence; I never forget injuries or injustices (Type Eight).

I feel critical of myself for lacking initiative and discipline; I become confused about what I really want; I feel ignored and unimportant; I tune out (Type Nine).

(Adapted from www.9types.com)

One of the most important insights I have had in my adult life is the following: My wife sometimes responds as an Eight. So when my wife is angry, belligerent and hostile, don't take it personally. She just wants to be reassured that everything is going to be all right. Yeah, right. If only I had known this 20 years ago. It would have saved her and me a lot of stress. Unfortunately, I usually took it personally and have not always been able to reassure her.

(c) ***Failure***

It is clear when we feel angry with ourselves or guilty for not being good enough, we will likely not take care of ourselves. We will escape into food, drink or other distractions. We will become self-destructive to punish ourselves. So why do some of my patients with diabetes make their diabetes go away (by changing their lives and losing weight) and some fail to do so. And what can I do as a physician (and healer?) to help them?

(d) ***Hell has three doors: lust, rage and greed!***

Rage is the lifelong misinterpretation of the world (and the people in it). Such as not reassuring my wife but running away instead, intimidated by the hostility and uncomfortable with facing it. And yet my wife very strongly feels there is that little girl still inside of her, although her colleagues might claim this is really a saber tooth tiger dressed up as a little girl.

Understanding our approach to stress is important in understanding and appreciating others and ourselves and thereby reducing stress.

Fear and anger lead to stress -> choosing unhappiness

(e) ***Understand your reactions***

Section (b) on page 77, *Which is your predominant response to stress*, gives us clues to some of our misinterpretations of the world and the people in it. The nine types discussed are as follows:

One	Reformer	I do everything the right way
Two	Helper	I must help others
Three	Motivator	I need to succeed
Four	Romantic	I am unique
Five	Thinker	I need to understand the world
Six	Skeptic	I am affectionate and skeptical
Seven	Enthusiast	I am happy and open to new things
Eight	Leader	I must be strong
Nine	Peacemaker	I am at peace

Look back at the response to stress which spoke to you most strongly. Then go to the descriptions beginning on page 81 and see if they are helpful. There is also an online test you can take (www.9types.com) but a more accurate way is to read the descriptions carefully and see which one fits you the best. Sometimes we answer the test questions the way we want to appear rather than who we are. Most people will get an *Aha! That's me!* response to one of the descriptions. And it may be a type you scored lower on the test.

When you figure out what type you are, there are suggestions for what your strengths are, what you find difficult, and how other people can get along with you (definitely share this section with your family and friends). It also helps if you know what your spouse and other family members are, because the hints can be very helpful (*Yes dear, everything is going to be just fine*). Don't take my word for it. Try it.

The more you understand your response to stress, the more you will be able to do this. Following each Type description is a list of affirmations, which can help us to change our minds and begin to think and live more positively.

(g) ***The summaries of the 9 types***

The following pages summarize important work done by Renee Baron, Elizabeth Wagele and Don Richard Riso. Please see their books listed below for a more in-depth discussion.

Renee Baron & Elizabeth Wagele, The Enneagram Made Easy: Discover the 9 Types of People. Harper, San Francisco, 1994, 161 pages.

Don Richard Riso, Enneagram Transformations: Release and Affirmations for Healing Your Personality Types Houghton Mifflin Company, 1993, 129 pages.

1 Perfectionists (the One)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People
by Renee Baron and Elizabeth Wagele; published by Harper San Francisco in 1994.

Perfectionists are realistic, conscientious, and principled. They strive to live up to their high ideals.

What I Like About Being a One

Being self-disciplined and able to accomplish a great deal
Working hard to make the world a better place
Having high standards and ethics; not compromising myself
Being able to put facts together, coming to good understandings, and figuring out wise solutions
Being the best I can be and bringing out the best in other people

What's Hard About Being a One

Being disappointed with myself or others when my expectations are not met
Feeling burdened by too much responsibility
Thinking that what I do is never good enough
Being upset because others aren't trying as hard as I am
Obsessing about what I did or what I should do

How to Get Along with Me

Take your share of the responsibility so I don't end up with all the work
Acknowledge my achievements
I'm hard on myself. Reassure me that I'm fine the way I am
Be fair and considerate, as I am
Apologize if you have been unthoughtful. It will help me to forgive
Gently encourage me to lighten up and to laugh at myself when I get uptight, but hear my worries first

Ones as Children Often

Criticize themselves in anticipation of criticism from others
Refrain from doing things that they think might not come out perfect
Focus on living up to the expectations of their parents and teachers

Are very responsible; may assume the role of parent
Hold back negative emotions (good children aren't angry)

Ones as Parents

Teach their children responsibility and strong moral values
Are consistent and fair
Discipline firmly

Affirmations for Ones

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

Holding others and myself to impossible standards
Rationalizing my own behavior
Obsessing about things I cannot change
Feeling that other people's beliefs and values threaten mine
Believing that I am in a position to judge others
Driving myself and others to be perfect
Ignoring my own emotional and physical distress
Fearing and disowning my body and my feelings
Allowing my desire for order and efficiency to control my life
Automatically focusing on what is wrong with things
Feeling that it is up to me to fix everything

I now affirm...

That I can allow myself to relax and enjoy life
That the best I can do is good enough
That I am grateful that others have many things to teach me
That I can make mistakes without condemning myself
That my feelings are legitimate and that I have a right to feel them
That I treat others with tenderness and respect
That I am gentle and forgiving of others and myself
That life is good and unfolding in miraculous ways

2 The Helper, the Giver (the Two)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Helpers are warm, concerned, nurturing, and sensitive to other people's needs.

What I Like About Being a Two

Being able to relate easily to people and to make friends
Knowing what people need and being able to make their lives better
Being generous, caring, and warm
Being sensitive to and perceptive about others' feelings
Being enthusiastic and fun-loving, and having a good sense of humor

What's Hard About Being a Two

Not being able to say no
Having low self-esteem
Feeling drained from overdoing for others
Criticizing myself for not feeling as loving as I think I should
Being upset that others don't tune in to me as much as I tune in to them
Working so hard to be tactful and considerate that I suppress my real feelings

How to Get Along with Me

Tell me that you appreciate me. Be specific
Share fun times with me
Take an interest in my problems, though I will probably try to focus on yours
Be gentle if you decide to criticize me

Twos as Children Often

Are very sensitive to disapproval and criticism
Try hard to please their parents by being helpful and understanding
Are outwardly compliant
Are popular or try to be popular with other children
Act coy, precocious, or dramatic in order to get attention

Are clowns and jokers (the more extroverted Twos), or quiet and shy (the more introverted Twos)

Twos as Parents

Are good listeners, love their children unconditionally, and are warm and encouraging
Are often playful with their children
Wonder: *Am I doing it right? Am I giving enough? Have I caused irreparable damage?*
Can become fiercely protective

Affirmations for Twos

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

All attempts to justify my aggressive feelings
All attachment to feeling victimized and abused
The fear that I am unwanted and unloved
Abusing food and medications to make up for my loneliness
Feeling that others owe me for the things I have chosen to do for them
All physical ailments, aches, and complaints
Feeling possessive of loved ones
Doing things for others to make myself needed
Not wanting to acknowledge my negative feelings

I now affirm...

That I own all of my feelings without fear
That I am clear and conscious of my motives
That I am lovable for whom I am
That my happiness does not depend on pleasing others
That I can let go of loved ones
That I nurture my own growth and development
That I love others without expecting anything in return
The joy and warmth that fills my heart
My gratitude for all that others have given me

3 The Achiever (the Three)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Achievers are energetic, optimistic, self-assured, and goal oriented.

What I Like About Being a Three

Being optimistic, friendly, and upbeat
Providing well for my family
Being able to recover quickly from setbacks and to charge ahead to the next challenge
Staying informed, knowing what's going on
Being competent and able to get things to work efficiently
Being able to motivate people

What's Hard About Being a Three

Having to put up with inefficiency and incompetence
The fear on not being -- or of not being seen as -- successful
Comparing myself to people who do things better
Struggling to hang on to my success
Putting on facades in order to impress people
Always being on. It's exhausting.

How to Get Along with Me

Leave me alone when I am doing my work
Give me honest but not unduly critical or judgmental feedback
Help me keep my environment harmonious and peaceful
Don't burden me with negative emotions
Tell me you like being around me
Tell me when you're proud of my accomplishments or me

Threes as Children Often

Work hard to receive appreciation for their accomplishments
Are well liked by other children and by adults
Are among the most capable and responsible children in their class or school

Are active in school government and clubs or are quietly busy working on their own projects

Threes as Parents

Are consistent, dependable, and loyal
Struggle between wanting to spend time with their children and wanting to get more work done
Expect their children to be responsible and organized

Affirmations for Threes

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

Being obsessed by my hostile feelings toward others
Believing that sabotaging others will make things better for me
Feeling jealous of others and their good fortune
My fear of failing and being humiliated
Feeling that I must conceal my mistakes and limitations
Closing down my feelings in order to function
The grandiose expectations I have of myself
Craving constant attention and affirmation
Using arrogance to compensate for my own insecurity
Concealing myself behind masks
Driving myself relentlessly to be the best

I now affirm...

That I have value regardless of my achievements
That I am centered and emotionally available
That I take in the love others give me
That I am responsible to those who look up to me
That I develop my true talents by accepting who I am
That I delight in the accomplishments and successes of others
That I can reveal my real self without being afraid

4 The Romantic (the Four)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Romantics have sensitive feelings and are warm and perceptive.

What I Like About Being a Four

My ability to find meaning in life and to experience feeling at a deep level
My ability to establish warm connections with people
Admiring what is noble, truthful, and beautiful in life
My creativity, intuition, and sense of humor
Being unique and being seen as unique by others
Having aesthetic sensibilities
Being able to easily pick up the feelings of people around me

What's Hard About Being a Four

Experiencing dark moods of emptiness and despair
Feelings of self-hatred and shame; believing I don't deserve to be loved
Feeling hurt or attacked when someone misunderstands me
Expecting too much from myself and life
Fearing being abandoned
Longing for what I don't have

How to Get Along with Me

Give me plenty of compliments. They mean a lot to me
Be a supportive friend or partner. Help me to learn to love and value myself
Respect me for my special gifts of intuition and vision
Don't tell me I'm too sensitive or that I'm overreacting!

Fours as Children Often

Have active imaginations: play creatively alone or organize playmates in games
Are very sensitive, often feel that they don't fit in
Attach themselves to idealized teachers, heroes, artists, etc.
Become antiauthoritarian or rebellious when criticized or not understood
Feel lonely or abandoned (perhaps as a result of a death or their parents' divorce)

Fours as Parents

Help their children become who they really are
Support their children's creativity and originality
Are good at helping their children get in touch with their feelings
Are sometimes overly critical or overly protective

Affirmations for Fours

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

Turning my anger and aggressions against myself
All feelings of hopelessness and despair
All self-sabotaging thoughts and actions
The fear that I am unimportant and undesirable
Being distraught, fatigued, and inhibited
All claims of needing to be treated differently
Wanting to protect myself by withdrawing from others
All wasteful fantasies and romantic longings
Dwelling on the past to prolong my feelings

I now affirm...

That I am not defined by my feelings
That I open myself up to people and the world
That I use all of my experiences to grow
The goodness of my life, my friends, and myself
That I am free of the damage of my past
That I am transforming my life into something higher
That I am bringing something good and beautiful into the world

5 The Observer (the Five)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People
by Renee Baron and Elizabeth Wagele; published by Harper San Francisco in 1994.

Observers have a need for knowledge and are introverted, curious, analytical, and insightful.

What I Like About Being a Five

Standing back and viewing life objectively
Coming to a thorough understanding; perceiving causes and effects
My sense of integrity: doing what I think is right and not being influenced by social pressure
Not being caught up in material possessions and status
Being calm in a crisis

What's Hard About Being a Five

Being slow to put my knowledge and insights out in the world
Being pressured to be with people when I don't want to be
Watching others with better social skills, but less intelligence or technical skill, do better professionally

How to Get Along with Me

Be independent, not clingy
Speak in a straightforward and brief manner
I need time alone to process my feelings and thoughts
Remember that if I seem aloof, distant, or arrogant, it may be that I am feeling uncomfortable
If I become irritated when I have to repeat things, it may be because it was such an effort to get my thoughts out in the first place
Help me to avoid my pet peeves: big parties, other people's loud music, overdone emotions, and intrusions on my privacy

Fives as Children Often

Spend a lot of time alone reading, making collections, and so on
Have a few special friends rather than many

Are very bright and curious and do well in school
Have independent minds and often question their parents and teachers
Watch events from a detached point of view, gathering information
Are sensitive; avoid interpersonal conflict

Fives as Parents

Are often kind, perceptive, and devoted
Are sometimes authoritarian and demanding
May expect more intellectual achievement than is developmentally appropriate
May be intolerant of their children expressing strong emotions

Affirmations for Fives

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

All fearfulness of the world around me
All feelings of powerlessness and hopelessness
My fear of being violated or overwhelmed by others
My dark and destructive fantasies
Isolating myself by rejecting others
Believing that no one can be depended on
Fearing that others will exploit me
Feeling that I am a misfit in life
Being secretive and hiding from people
Postponing my emotional needs
Feeling that I always need to know more before I do anything
Avoiding my life by escaping into my mind

I now affirm...

The strength and wonder of my body
The value of my inventiveness and sense of humor
That I accept uncertainty and ambiguity
That my life and struggles are meaningful and rewarding
That I find serenity in being compassionate toward others
That I support others from the fullness of my heart

6 The Questioner (the Six)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People
by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Questioners are responsible, trustworthy, and value loyalty to family, friends, groups, and causes. Their personalities range broadly from reserved and timid to outspoken and confrontative.

What I Like About Being a Six

Being committed and faithful to family and friends
Being responsible and hardworking
Being compassionate toward others
Being a nonconformist
Being direct and assertive

What's Hard About Being a Six

The constant push and pull involved in trying to make up my mind
Procrastinating because of fear of failure; having little confidence in myself
Fearing being abandoned or taken advantage of
Exhausting myself by worrying and scanning for danger
Wishing I had a rule book at work so I could do everything right
Being too critical of myself when I haven't lived up to my expectations

How to Get Along with Me

Be direct and clear
Listen to me carefully
Don't judge me for my anxiety
Work things through with me
Gently push me toward new experiences
Try not to overreact to my overreacting

Sixes as Children Often

Are friendly, likable, and dependable, and/or sarcastic, bossy, and stubborn
Are anxious and hypervigilant; anticipate danger
Form a team of us against them with a best friend or parent

Are neglected or abused, come from unpredictable or alcoholic families, and/or take on
The fearfulness of an overly anxious parent

Sixes as Parents

Are often loving, nurturing, and have a strong sense of duty
Are sometimes reluctant to give their children independence
Worry more than most that their children will get hurt
Sometimes have trouble saying no and setting boundaries

Affirmations for Sixes

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

My fear of being abandoned and alone
My self-defeating, self-punishing tendencies
Feeling persecuted, trapped, and desperate
Overreacting and exaggerating my problems
Taking out my fears and anxieties on others
Being suspicious of others and thinking the worst of them
Feeling inferior and incapable of functioning on my own
Blaming others for my own problems and mistakes
My tendency to be negative and complaining
My fear of taking responsibility for my mistakes

I now affirm...

That I am independent and capable
That I can keep my own identity in groups and in relationships
That I have faith in myself, my talents, and my future
The kinship I have with every human being
That I am understanding and generous to all that need me

7 The Adventurer (the Seven)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Adventurers are energetic, lively, and optimistic. They want to contribute to the world.

What I Like About Being a Seven

Being optimistic and not letting life's troubles get me down
Being outspoken and outrageous. It's part of the fun.
Being generous and trying to make the world a better place
Having the guts to take risks and to try exciting adventures
Having such varied interests and abilities

What's Hard About Being a Seven

Not having enough time to do all the things I want
Not completing things I start
Not being able to profit from the benefits that come from specializing; not making a commitment to a career
Having a tendency to be ungrounded; getting lost in plans or fantasies
Feeling confined when I'm in a one-to-one relationship

How to Get Along with Me

Give me companionship, affection, and freedom.
Engage with me in stimulating conversation and laughter
Appreciate my grand visions and listen to my stories
Don't try to change my style. Accept me the way I am
Be responsible for yourself. I dislike clingy or needy people
Don't tell me what to do

Sevens as Children Often

Are action oriented and adventuresome
Drum up excitement
Prefer being with other children to being alone
Finesse their way around adults
Dream of the freedom they'll have when they grow up

Sevens as Parents

Are often enthusiastic and generous
Want their children to be exposed to many adventures in life
May be too busy with their own activities to be attentive

Affirmations for Sevens

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

All reckless and destructive impulses
Feeling that I will be overwhelmed by anxiety
All compulsions and addictions
Burning myself out by trying to satisfy all of my desires
Insulting or abusing others to vent my frustrations
Allowing my insecurities to drive me into dangerous situations and behavior
Sacrificing my health and happiness for instant gratification
Fearing that there will not be enough for me
Wanting every moment to be exciting and dramatic
Escaping from myself through distractions and constant activity
Believing external things will make me happy

I now affirm...

That I am happiest when I am calm and centered
That I can say no to myself without feeling deprived
That I am resilient in the face of setbacks
That I find satisfaction in ordinary things
That I stay with projects until I complete them
That I care deeply about people and am committed to their happiness
That there is a spiritual dimension to my life
That I am profoundly grateful to be alive

8 Asserters; the Boss (the Eight)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People
by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Asserters are direct, self-reliant, self-confident, and protective.

What I Like About Being an Eight

Being independent and self-reliant
Being able to take charge and meet challenges head on
Being courageous, straightforward, and honest
Getting all the enjoyment I can out of life
Supporting, empowering, and protecting those close to me
Upholding just causes

What's Hard About Being an Eight

Overwhelming people with my bluntness; scaring them away when I don't intend to
Being restless and impatient with others' incompetence
Sticking my neck out for people and receiving no appreciation for it
Never forgetting injuries or injustices
Putting too much pressure on myself
Getting high blood pressure when people don't obey the rules or when things don't go right

How to Get Along with Me

Stand up for yourself... and me
Be confident, strong, and direct
Don't gossip about me or betray my trust
Be vulnerable and share your feelings. Acknowledge my tender, vulnerable side
Acknowledge the contributions I make, but don't flatter me
I often speak in an assertive way. Don't automatically assume it's a personal attack
When I scream, curse, and stomp around, try to remember that's just the way I am

Eights as Children Often

Are independent; have an inner strength and a fighting spirit

Seize control so they won't be controlled
Figure out others' weaknesses
Attack verbally or physically when provoked
Take charge in the family because they perceive themselves as the strongest

Eights as Parents

Are often loyal, caring, involved, and devoted
Are sometimes overprotective
Can be demanding, controlling, and rigid

Affirmations for Eights

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

All anger, rage, and violence from my life
Being verbally or physically abusive
Believing that taking vengeance will free me from my own pain
Hardening my heart against suffering
My fear of ever being vulnerable or weak
Believing that I must bully people to get my way
My fear that others will control me
My fear of losing to anyone
Feeling that I must never be afraid
Attempting to control everything in my life
Allowing my pride and ego to ruin my health and relationships
Thinking that anyone who does not agree with me is against me

I now affirm...

That I believe in people and care about their welfare
That I am big-hearted and let others share the glory
That I am most fulfilled by championing others
That I can be gentle without being afraid
That I master my own passions and myself
That there is an authority greater than I am
That I love others and ask for their love in return

9 Peacemaker (the Nine)

Adapted from The Enneagram Made Easy: Discover the 9 Types of People by Renee Baron and Elizabeth Wagele, published by Harper San Francisco in 1994.

Peacemakers are receptive, good-natured, and supportive. They seek union with others and the world around them.

What I Like About Being a Nine

Being nonjudgmental and accepting
Caring for and being concerned about others
Being able to relax and have a good time
Knowing that most people enjoy my company; I'm easy to be around
My ability to see many different sides of an issue and to be a good mediator and facilitator
My heightened awareness of sensations, aesthetics, and the here and now
Being able to go with the flow and feel one with the universe

What's Hard About Being a Nine

Being judged and misunderstood for being placid and/or indecisive
Being critical of myself for lacking initiative and discipline
Being too sensitive to criticism; taking every raised eyebrow and twitch of the mouth personally
Being confused about what I really want
Caring too much about what others will think of me
Not being listened to or taken seriously

How to Get Along with Me

If you want me to do something, how you ask is important. I especially don't like expectations or pressure
I like to listen and to be of service, but don't take advantage of this
Listen until I finish speaking, even though I meander a bit
Give me time to finish things and make decisions. It's OK to nudge me gently and non-judgmentally
Ask me questions to help me get clear
Hug me, show physical affection. It opens me up to my feelings
I like a good discussion but not a confrontation

Nines as Children Often

Feel ignored and that their wants, opinions, and feelings are unimportant
Tune out a lot, especially when others argue
Are good children, deny anger or keep it to themselves

Nines as Parents

Are supportive, kind, and warm
Are sometimes overly permissive or non-directive

Affirmations for Nines

Adapted from Enneagram Transformations: Release and Affirmations for Healing Your Personality Types by Don Richard Riso, Houghton Mifflin Company, 1993.

I now release...

Not taking an active interest in my own life
Turning away from whatever is unpleasant or difficult
Being numb and emotionally unavailable
Refusing to see my own aggressions
All dependency and fear of being on my own
Neglecting my own legitimate needs and myself
Seeking quick, easy solutions to my problems
Feeling threatened by significant changes in my life
Losing myself in comforting habits and routines
Feeling that most things are just too much trouble
Going along with others to keep the peace
Living through others and not developing myself

I now affirm...

That I am confident, strong, and independent
That I develop my mind and think things through
That I am proud of my abilities and myself
That I look deeply into myself without fear
That I am a powerful, healing force in my world
That I actively embrace all that life brings

Part 2

When You Need to See Your Doctor

Information that will help you ask the right questions

Your Lifestyle Accounts for 75% of Your Risk of Disease and Death

7

DISEASE PREVENTION AND EARLY DETECTION

As presented in the introduction, genetics (as seen in the health of your parents, brothers and sisters) predicts 25-30% of your risk of your disease. The other 75% can be predicted and potentially modified by lifestyle. So your genes are not everything. It almost always takes more than one hit to produce disease. You have to add either a toxic exposure (cigarette smoke, radon, mercury or benzene), lack of good nutrition, some infection, or perhaps depression or hostility to overcome the body's inherent ability to heal.

1 Genetic Predisposing Factors and Modifiable Risk Factors

(a) *Genetics*

Our genes are the DNA molecules that determine the structure and function of our bodies. There are certain genes that appear to promote cancer, which are referred to as oncogenes (cancer genes). Individual genes have been shown to promote cancer of the breast, colon, prostate, ovary, as well as other cancers. The best indicator of this is when you have one or more family members with a certain kind of cancer. This is especially true in breast and colon cancer. In fact, if your first-degree relative (a parent, sibling or child) has either breast or colon cancer, you are at somewhat higher (2 or 3 times higher) risk for both cancers. This means that if you have a mother or sister with breast cancer, then you (and they) need a colonoscopy to screen for colon cancer as well.

Coronary disease is associated with several inherited conditions. These include genetically high cholesterol (Familial Hyperlipidemia and elevated Lipoprotein (a), increased risk of blood clots (Factor V Leiden), diabetes Type 2, Vitamin K resistance and others. If you have family members who develop early heart disease (in their 50's or earlier), you need to have your physician explore whether you have developed any early disease yourself. It is also worthwhile to have the affected family member and you checked for the more common inherited causes as listed above.

Mitochondria are the small parts of each cell that create energy to keep the cell working and healthy. Each mitochondria has its own genetic code. Abnormalities of these mitochondrial genes can cause Alzheimer's disease, diabetes, congestive heart failure, and others. As is discussed in the chapter on aging, our mitochondria (the powerhouse of the cell) come entirely from our mother's egg. Some mitochondria are much less prone to oxidative stress and therefore last much longer. This allows our cells to continue to function at full efficiency and protect the cell from aging and premature death. Therefore, your mother's and her mother's health are good indicators of your future. Try to avoid excess oxidative stress (smoking cigarettes and eating a high sugar diet).

The most common inherited disorder is hemachromatosis (iron storage disease). This is a defect of excess absorption of iron leading to heart failure, diabetes and liver disease. It is prevented by avoiding excess iron (in vitamins, red wine, and red meat) and donating blood regularly (2-3 times per year). There are many other inherited diseases including Hemophilia, Muscular Dystrophy, Sickle Cell, and other metabolic diseases.

Insulin Resistance and diabetes Type 2 (especially in American Indians, Indians from India, and other populations prone to famine) is a trait that helps individuals store excess energy as fat during times of plenty and thereby survive periods of famine. This is referred to as the thrifty genotype. These individuals are now at a definite disadvantage in these times of plenty. They gain weight, develop the metabolic syndrome including high blood pressure, high blood sugars and high cholesterol. This leads to diabetes, heart disease, depression and cancer.

(b) ***Nutrition***

Obesity has been linked to early fetal malnutrition. Obesity and subsequent insulin resistance have been shown to promote the development of diabetes, cancer, heart disease, and depression. Excesses of sugar, corn syrup, starches, and hydrogenated vegetable oils are all associated with the development of obesity and possibly cancer.

Deficiencies can also lead to serious health problems. It has been shown that patients with diabetes have significant deficiencies of chromium and magnesium leading to worsening insulin resistance. Supplementation with these substances improves outcomes in patient with diabetes. Vitamin B12 deficiency occurs as we age because of decreased efficiency of absorption. In those who develop Pernicious Anemia, B12 levels can become undetectable. Vitamin B12 deficiency can lead to anemia, severe neurologic disorders and elevated homocysteine levels and increased heart disease. Adequate intake of lutein is associated with less macular degeneration. Adequate selenium intake is associated with less cancer of the colon, prostate and lung.

Certain foods may also promote an adverse reaction by our immune system. Some studies suggest the some arthritis is related to the proteins called lectins in the nightshade vegetables (eggplant, tomatoes, potatoes and peppers) and corn (cornmeal is associated with the development of arthritis in dogs).

(c) ***Toxic Exposures***

The biggest problem with smoking cigarettes is that it causes wrinkles (not to mention the discolored teeth, receding gums and funny smelling clothes). As we all know, wrinkles are a sign of aging and we are all trying to reduce aging. So don't smoke cigarettes! In addition, the tars and carbon monoxide from smoking also damage our lungs and our brains, respectively.

Heavy metals including lead and mercury damage our nervous systems. Be careful while you are stripping paint. Try to eat smaller fatty fish (sardines, herring, mackerel and salmon which are lower in mercury) and to reduce your intake of tuna, swordfish and other large predator fish (which are much higher in mercury). If you are going to eat tuna, eat the light tuna that is usually lower in mercury (and the healthy oils as well). Albacore tuna is the highest in mercury.

Environmental toxins including PCBs, radon, asbestos, and radiation promote oxidative stress and inflammation resulting in tissue damage and disease. Try to live in a well-ventilated house and drink water you can trust (filtered tap water is acceptable).

The excessive intake of alcohol is associated with liver disease, heart failure, dementia and accidents. Any consumption of alcohol more than nine drinks per week for women or fourteen drinks per week for men may be suspect.

(d) ***Infections***

What is somewhat scary about cervical cancer is that it appears to be a sexually transmitted disease. Women who have not had sex do not get cervical cancer. Cervical cancer has been associated with numerous infections including HPV (venereal warts), HHV6 (Human Herpes Virus 6), and HIV (the AIDS virus). Be careful with whom you have sex, because in having sex you are sharing yourself with everyone your partner has had sex with previously.

In the 1980's, physicians would not believe that duodenal ulcers could be due to an infection. It was clear they were stress-induced. But, in fact, almost all duodenal ulcers are caused by an infection with the Helicobactor pylori bacteria. And treating this infection now eliminates future ulcer disease. Medical science moves on.

It is clear there is significant arthritis resulting from Lyme disease. It is also clear that the treatment of Lyme disease improves the arthritis. The same is true of the immune-mediated arthritis from gonorrhea. It is probably also true that many patients with chronic arthritis and other autoimmune diseases who have underlying infections such as Mycoplasma pneumoniae may improve with antibiotic treatment.

We know that inflammation of blood vessels leads to coronary artery disease and other vascular disease. It is unclear what is the underlying cause of this inflammation. At least some of this inflammation is due to angiotensin and other hormones, but there is evidence that certain infections also damage blood vessels. Two of these infections are Cytomegalovirus (CMV) and Chlamydia pneumoniae (an organism similar to Mycoplasma pneumoniae, the cause of the common walking pneumonia). In one study looking at patients who had blood tests positive for an immune response to Chlamydia (the patients had positive antibody titers), patients treated with three days of Biaxin (an antibiotic similar to erythromycin) had much less recurrence of coronary disease complications following angioplasty. Unfortunately, ongoing trials looking at the use of antibiotics in the prevention of heart attacks have not shown as much promise.

(e) ***Accidents***

Why do some people appear to be accident-prone? There are people who have been driving for only 10 years and yet have been rear-ended three times, while other people have driven for 50 years and millions of miles and have yet to be rear-ended. Do some people attract problems while others ward them off? Some of this can be due to aggression and carelessness in driving (including cellular phones). Some is definitely due to self-destructive thoughts leading to dangerous driving.

Sports injuries are often due to trying your hardest and giving your all. Some of this is necessary to allow us to do our best. It is important to use appropriate protective equipment such as helmets while cycling and ultimate downhill skiing.

(f) ***Attitude***

Hostility definitely leads to heart disease. As was stated in the *Accidents* section above, it can lead to any number of negative occurrences. There is a strong association of depression with the development of cancer. This is true even when you exclude cancers occurring within five years of the diagnosis of depression. This is what the first half of this book is trying to address.

2 Diseases We Worry About and Try to Prevent or Find Early

Which diseases concern us and how can we avoid them or at least find them early enough to successfully treat them and prevent complications? Some families are predisposed to illnesses such as cancer of the breast, colon, and prostate, high cholesterol, diabetes, or heart disease. Family history (early heart disease or breast/colon cancer), genetic screening (hemachromatosis, breast cancer), and surveillance for early disease (mammograms and sigmoidoscopy) are attempts to reduce complications by either preventing the problem or discovering the problem early enough for cure.

(a) ***Atherosclerotic Heart and Cerebrovascular Disease*** *(Heart Attacks and Strokes)*

Men 35 years old and women 45 years old (those with no family history of early heart disease in their parents or siblings) need to have a Lipid panel (Cholesterol, LDL, HDL, Triglycerides).

In families with a history of early heart disease, I suggest getting the following additional lab tests: Lipid panel, Lipoprotein (a), Homocysteine, Hemoglobin A1c, and Ferritin. If all of these look normal, I consider getting a Factor V Leiden, which is a genetic test for an abnormal clotting factor that is associated with early heart disease and stroke. If you develop an uncomfortable tightness in your chest with exertion that resolves with rest, this may be the onset of angina (coronary heart disease) and you should see your doctor as soon as possible. Please see the chapter on heart disease for full details

Prevention: follow the Mediterranean Hunter-Gatherer diet (which lowers all cardiovascular risk factors; see Appendix 1 for a brief summary) and consider getting a screening carotid ultrasound to see if you are building atherosclerotic plaque (blockages). Lifelinescreening.com is one reputable company and charge $45 for the scan. If they find blockages on the scan, you will require a much more aggressive approach to preventing a heart attack or stroke over the next thirty years.

(b) ***Breast cancer***

There is increased risk if you have a parent or sibling who has had either breast or colon cancer (these two cancers tend to run together); begin screening with annual mammograms at an age that is 10 years earlier than the age of the family member when they were diagnosed.

Without a family history of breast or colon cancer as above, routine annual mammograms are suggested after 50 years of age. You may begin having mammograms in your 40's but they are less accurate and have not been proven to reduce mortality. If you find a breast lump and you are in your mid-twenties or older, get it checked by your doctor. Reduce sugar and starch because insulin resistance promotes breast, colon, pancreatic and prostate cancer.

Prevention: keep your waist less than 30 inches in women and 35 inches in men. Yes, men do get breast cancer. Avoid hormone replacement if possible (use only for significant symptoms) and consider taking tamoxifen or raloxifen if you have a strong family history of breast cancer (in a mother or sister). Discuss this with your doctor.

(c) ***Colon cancer***

Similar to breast cancer, if you have a parent or sibling with colon or breast cancer, begin screening with colonoscopy every five years beginning at an age that is 10 years earlier than the age of the family member when they were diagnosed with cancer.

Without a family history of breast or colon cancer as above, routine screening with annual Hemoccult card screening (checks for blood in your stool) and sigmoidoscopy (a scope which looks for cancer in the last third of your colon) are suggested after 50 years of age (and reimbursed by insurance). There is movement toward suggesting routine colonoscopy at 55 and 65 years of age. Virtual colonscopy (actually a cat scan of the abdomen performed after cleansing the colon) has now been shown to be accurate, but if abnormalities are found, you will need to undergo a second cleansing and true colonoscopy with a scope and anesthesia.

If you are over 40 years old and see blood in your stool or have a change in bowel habits, see your doctor for evaluation. If you are over 40 years old and have iron deficiency anemia without a known cause such as menstruation, you probably need a colonoscopy to evaluate for causes of blood loss.

Prevention: aspirin and ibuprofen may reduce colon cancer, as does having one or two bowel movements per day. So take your magnesium, drink 8-12 glasses of water per day and get some exercise.

(d) ***Prostate cancer***

It is not clear that screening for prostate cancer saves lives. Most men die with prostate cancer, not of it. Men with aggressive prostate cancer tend to die from their disease no matter how early we find it or how aggressively we treat it. Many men with prostate cancer who do well probably would have done well even if we had left them alone.

Prostate Specific Antigen (PSA) is a poor test. The normal range has been set at 0-4ng/ml. If your PSA is less than 1.0, it is unlikely you have prostate cancer. If your PSA is over 23, you probably do have prostate cancer (although I have had patients not have prostate cancer at that level, just an enlarged prostate with infection). PSA levels can be helpful if one looks at a series of PSA levels. If the level is staying stable, it is unlikely anything is growing. If the level is rising, this can suggest a serious problem even if the levels are still in the normal range.

Who can benefit from aggressive treatment of prostate cancer? Prostate biopsies are given a Gleason score. A Gleason score of 7, 8, 9, or 10 suggest a very aggressive tumor and needs to be treated aggressively. The treatment may be surgery, hormonal manipulation, radiation, radioactive implants, or a combination. If your Gleason score is 5 or less it is unlikely you will die from this prostate cancer (applicable for people over 55-60 years old; younger people tend to always be treated aggressively because this is usually a disease of old men). A Gleason score of 6 tends to be watched in the older patient (over 70 years old) and treated more aggressively in the younger patient (less than 60 years old).

Prevention: taking selenium appears to reduce the development of prostate cancer (200 mcg per day), as does staying lean (waist less than 35 inches) and avoiding sugar. Proscar (a

medication to shrink the prostate) appears to increase death from prostate cancer. I also wonder about saw palmetto (an herbal supplement that improves prostate function) and Propecia (a drug for hair growth). It makes sense to only take saw palmetto or Proscar if you are getting up 3-4 times at night to urinate. Flaxseed and flax oil have also been possibly associated with increased prostate cancer, so I recommend using the cod liver oil instead.

(e) ***Cervical cancer***

Pap smears are very effective at early detection of cervical cancer. Begin screening at the onset of heterosexual sexual activity. Low risk patients (one sexual partner, no sexually transmitted diseases, normal pap smears in past) can be screened every 3 years after having 2 normal Pap smears a year apart. High-risk patients (multiple sexual partners, Herpes or venereal warts, HIV or abnormal Pap smears in the past) need annual screening with Pap smears.

Prevention: have only one sexual partner who has only one sexual partner (you) and if you are having sex, get your pap smears every 1-3 years as appropriate.

(f) ***Diabetes Type 2***

Many people are walking around with pre-diabetes or undiagnosed diabetes. If you are overweight, it is important to have your doctor order a hemoglobin A1c (a test that measures blood sugar control). This is also true for those of us with a high waist circumference, a family history of diabetes, high cholesterol and/or triglycerides, or hypertension.

Although the normal range for A1c is 3.8-6.1, try to keep your A1c level at 5.0 or less. There is a 28% increase in total mortality if your level rises from 5.4 to 6.4. Please see the chapter on diabetes for full details.

Prevention: get your waist down to less than 35 inches in men and 30 inches in women, and take some supplemental chromium (200-500mcg per day) and magnesium (250-500mg per day) and follow the Mediterranean Hunter-Gatherer diet.

(g) ***Osteoporosis(Bone Loss)***

Your risk of osteoporosis increases if you have a history of any of the following:

1. Hyperthyroidism (over-active thyroid gland)
2. Hyperparathyroidism (elevated blood calcium levels)
3. Excess cola intake (with phosphoric acid)
4. Prednisone use (oral steroid)
5. Family history of osteoporosis
6. Alcohol overuse
7. Cigarette smoking
8. Diet poor in green vegetables

9. Caucasian or Asian race
10. Lack of sun exposure or Vitamin D intake
11. Female sex

A screening test can evaluate the heel or wrist, and if this result is abnormal it should be confirmed with a formal DEXA scan evaluating the lower back and one hip. There are medications that can help stabilize and even strengthen weak bones so it is important to know where you stand. The problem is they may also make the bone more brittle and prone to fractures, so it is better to prevent the problem by avoiding the above listed risk factors.

Prevention: walk, lift light weights (five to eight pounds for 15 to 20 repetitions), eat sardines and dark green vegetables (or take calcium and magnesium supplements). Take some vitamin D (either one tablespoon of cod liver oil or 800 units of supplement – but not both) or live in Florida (get some sun, but for Pete's sake do not get burned). Do not drink colas or other soft drinks with phosphoric acid, which leaches calcium from bones and is causing an epidemic of osteoporosis among young women. Avoid excess alcohol and cigarettes.

(h) *Hemachromatosis (Excess Iron Absorption and Storage)*

Hemachromatosis is the most common inherited disorder in Caucasians; one of the genes is present in one of every 12 people. The disease occurs in 1/150 people because it takes two copies of the gene to cause the disease, one each from your mother and your father. Hemachromatosis is an iron storage disease caused by the over-absorption of dietary iron. The iron is stored in and damages the liver, heart, and pancreas leading to cirrhosis of the liver, congestive heart failure and diabetes. It can also cause arthritis, particularly in the joint at the base of the thumb. We used to think that estrogen protected women from heart disease. Now it appears that the progressive accumulation of iron after the stopping of menstrual periods makes women after menopause more like men in their heart disease risk.

The American College of Physicians is coming close to recommending screening all Caucasian men and non-menstruating women using blood tests for Ferritin.

Prevention: donate blood at the Red Cross and avoid excess iron intake such as in some multivitamins and liver. Have your ferritin level checked (a blood test).

3 Diseases where screening has not been effective:

(a) *Ovarian cancer*

The death rate from cervical cancer plummeted after the introduction of routine pelvic exams and Pap smears. Despite all of those pelvic exams (an opportunity to find ovarian cancer), the deaths from ovarian cancer continue at the same rate or even slightly higher. Most ovarian

cancers have already spread throughout the abdomen when cancer is diagnosed. It is thought that the cells released from the ovaries during ovulation (the monthly release of the egg from the ovaries) spread throughout the abdomen and the cancers actually start in these cells at the same time as in the ovary. In patients with a genetic cause for the ovarian, even taking out the ovaries before problems develop may not prevent the ovarian cancer because the cells have already been released. It does appear to reduce the risk by 75-90% however.

Prevention: there has been an association of galactose (one of the sugars in cow's milk) with ovarian cancer (one more reason to avoid dairy and to eat sardines and leafy vegetables for your calcium instead). Christiane Northrup MD suggests a positive sex life might also decrease the risk of ovarian cancer.

(b) ***Lung cancer***

Screening chest x-rays have not been shown to reduce death from lung cancer. Screening using ultra-fast CAT scanning is still in its infancy and has not shown a reduction in death in high-risk patients. Some of the small tumors they find are gone when they try to take them out. It is unclear if the body is able to handle most of these small tumors and that it is only certain tumors that grow beyond what the body can handle that kill patients. One approach is to follow small tumors for at least one year prior to biopsy. Studies suggest that tumors that do not grow do not need to be biopsied, and those that do grow will still be at an early stage and curable.

Prevention: stop smoking and take selenium. Consider CAT scan screening for lung cancer over the age of 45 years old if you have smoked for many years or have a family history of lung cancer in a parent, brother or sister.

It is estimated that more than half of the citizens of the United States have either borderline diabetes or diabetes.

Many do not even know they have a problem. Most of these only know they have big waists And think, *So What?*

8

MAKE YOUR DIABETES GO AWAY

Diabetes is dangerous. It is the leading cause of blindness in adults- 24,000 cases/year; it is also the leading cause of kidney failure in US- 28,000 cases/year. Having diabetes increases your risk of heart attacks and strokes 2-4 fold and this heart disease causes 60-70% of all diabetes deaths. Diabetes is the leading cause of non-traumatic amputations amounting to 67,000 limbs/year.

1 Diabetes can be healed

Eat as if your life depended on it. It does! The Thrifty Genotype (the inherited ability to store lots of fat during times of plenty) helped us to survive times of hardship (feast or famine). This was a survival advantage in the past, but not now. The Hunter-Gatherer diet will greatly improve or resolve high blood sugars.

(a) *There appears to be three types of patients with diabetes*

- Type 1 / Juvenile-Onset / Inadequate insulin resulting from the destruction of Pancreatic Islet cells. This disease is felt to be due to a viral infection in a susceptible person, although there is some evidence that consuming certain foods are also associated with antibodies against the pancreas.

- Type 2 / Adult-Onset / Syndrome X / Insulin resistance with hyperinsulinemia (high insulin levels) associated with weight gain, high cholesterol and high blood pressure. This is by far the most common form of diabetes. Even six-year-olds are developing this disease which used to occur mostly in patients in their 60's and 70's. This is due to our increasingly high starch, moderate fat diet and decreasing amounts of physical activity.

- Type 1½ / Intermediate / This type has elements of both insulin resistance and low insulin production. This is more common in people from Asia and

eventually will develop in patients with long-standing Type 2 diabetes with pancreatic Islet cell failure.

The majority of patients have Type 2 diabetes, so we will start there. Most of the nutritional information is also applicable to patients with Types 1 and 1½, which we will discuss later.

(b) ***What causes diabetes?***

In diabetes your body's insulin just doesn't work well enough to keep your blood sugars down in the normal range. Your body has insulin resistance; it resists the effects of your insulin. This causes your blood sugar goes up despite even high levels of insulin. The elevated blood sugar acts as molecular glue making your tissues and organs stiff and old. The excess sugar damages your eyes, your kidneys, your blood vessels, your nerves, your heart, and more.

In addition, the excess insulin released in response to the high blood sugar also promote weight gain, worsening insulin resistance, heart disease, and depression. Can we stop this? YES. Read on.

(c) ***Feast or Famine***

Insulin resistance helps you survive famines while thin people die of starvation. A person with insulin resistance is very effective at storing food during times of plenty to save for when food was not available (drought, long winters, etc.). They have what is called the thrifty genotype. This means they are very efficient at storing excess calories in times of plenty. They would have a great advantage in the old days.

But not now! We don't have famines anymore. We all have access to plenty of food right through the long winter. This insulin resistance is no longer an advantage. In fact, it can put your health at great risk. But there is hope; we can take a lesson from the Native Americans and the Australian Aborigines. When these peoples eat modern processed food, the majority of them develop diabetes. When they eat their native foods, their diabetes goes away. This is also true of nearly all patients with Type 2 diabetes.

(d) ***What are our native foods?***

Do you remember *Joseph and His Technicolor Dream Coat*? Seven years of plenty followed by seven years of famine. Think of the foods you could store for seven years: grains and flour, beans, potatoes and other root vegetables, and sugar. These are the foods of famine. Now think of foods which must be eaten within days of being harvested, especially those which are best eaten raw immediately. Those are the foods our ancestors collected and ate (we didn't have agriculture until very recently in the evolutionary sense).

To feed large numbers of people living in cities, we developed agriculture. We figured out how to grow wheat and rice and potatoes, foods you could transport and store for long periods of time without loss of quality (there were no trucks or refrigeration). People began to live on pasta, bread, potatoes and rice as their staples, because these foods were available and often the only foods they could afford (until modern times).

All starch (pasta, bread, potatoes, and rice) is rapidly converted to sugar. Starch turning to sugar causes higher insulin levels. Higher insulin levels promote increased appetite, fat storage, and the development of insulin resistance and diabetes-Type 2. The epidemic of heart disease, diabetes, cancer and depression in this century may stem in a large part from the amount of sugar, corn syrup (in soft drinks, etc.), and simple starches (in breads, etc.) we consume.

(e) ***Eat a Diet Rich in Healthy Oils***

Avoid the foods of famine. One approach to this is the Mediterranean Hunter-Gatherer diet, which was presented in detail in *The Staying Healthy Handout* in Appendix 1. This is not a high protein diet. This is a diet rich in green leafy vegetables, healthy oils, fish and meat and poultry, nuts, fruits and berries. If anything, this is a high oil diet. But isn't fat bad for you? Yes, and no. Corn oil and soybean oils may promote cancer. Hydrogenated vegetable oils promote higher bad cholesterol and lower good cholesterol. Saturated fat may promote small vessel disease in your brain and elsewhere (making your brain shrink-not good!).

So which oils are good for you? Olive oil and the tree-nut oils (almonds, walnuts) lower your bad cholesterol and raise your good cholesterol. The omega-3 oils in fish reduce cardiac arrhythmia and sudden death. And eating these good oils does not raise your blood sugar. Your body does not need extra insulin to metabolize the oil in your diet. Sounds like the perfect food for patients with diabetes. Please see *The Staying Healthy Handout* in Appendix 1.

(f) ***Watch Your Blood Sugars Drop***

Make sure you check your blood sugars and adjust your medication accordingly. Most patients will require much less medication when they eliminate sugar and starch. WATCH OUT FOR LOW BLOOD SUGARS! Many patients can get off their insulin and glyburide (a medication that raises your insulin level) altogether. I often suggest reducing insulin and/or glyburide by 30-50% initially and checking blood sugar regularly for further adjustments.

2 Medications for patients with Type 2 Diabetes

Since Type 2 diabetes is a problem of insulin resistance with too much insulin, you need medications that make your body more sensitive to your own insulin and lower your insulin level in your blood.

(a) *Medications that lower insulin level and reduce insulin resistance (Good for you)*

- Metformin (Glucophage)

Metformin works by reducing liver production of sugar. It is the only diabetes medication to both promote weight loss and reduce deaths from heart disease (the glyburide and excess insulin increase cardiac deaths). Metformin does not cause low blood sugars when used alone. It raises HDL (good) cholesterol, lowers LDL (bad) cholesterol, and lowers triglycerides. The one precaution is that metformin must be avoided if the kidney function is not normal.

- Rosiglitazone (Avandia) and Pioglitazone (Actos)

These medications work by reducing insulin resistance. They raise HDL (good) cholesterol, may raise LDL (bad) cholesterol (but not the small dense LDL, which is the really bad part) and they lower triglyceride levels. They may cause some weight gain, but they appear to reduce belly fat while increasing the fat on your arms and shoulders. There is some evidence they may protect the pancreas from further damage. It is important to have liver tests checked every 1-3 months when initiating therapy to make sure there is no adverse effects on the liver. Avoid these if liver function is not normal.

Watch out if you have congestive heart failure as these medications can cause you to hold onto too much fluid and go into heart failure.

(b) *Medications that raise insulin levels and worsen insulin resistance: (Not so good)*

- Glimepiride (Amaryl), Glyburide (Diabeta, Glynase, and Micronase), Glipizide (Glucotrol) Chlorpropamide (Diabinese)

These medications stimulate the pancreas to release more insulin. This increased insulin encourages increased appetite, weight gain and worsening of the insulin resistance. This class of medication is associated with increased rates of heart attack and cardiac death. They can also cause hypoglycemia (low blood sugars) when used alone or in combination.

- Repalinide (Prandin)

Also stimulates further insulin release, which worsens insulin resistance

- All forms of insulin (Humalog, Humulin, Novolin, Iletin, Lantus, etc.)

When used alone these promote weight gain and worsening insulin resistance. Never use more than 60 units of insulin per day. More insulin will not significantly improve glucose control and may accelerate heart disease development.

When used at bedtime in doses of 10-20 units and combined with daily metformin, weight loss is still possible. This also improves morning blood sugars and further reduces the liver production of sugar. Lantus is a very long acting insulin (lasts nearly 24 hours) and can help keep blood sugars controlled.

(c) ***Medications that slow the breakdown of starch***

- Acarbose (Precose) and Miglitol (Glyset).
- Not needed if you avoid starch (which is the whole point of the diet).

3 Additional Medications which are helpful for patients with Diabetes

(a) ***ACE Inhibitors*** *(Angiotensin Converting Enzyme Inhibitors)*

These are medications that treat high blood pressure and include quinapril, enalapril, ramipril, lisinopril, captopril, benzapril and others. This class of medications has been shown to protect the kidneys from aging. Ramipril (and others?) may protect blood vessels from aging. These medications reduce angiotensin, which when bound to angiotensin-2 receptors in the blood vessels causes inflammation leading to heart attacks and strokes.

(b) ***Angiotensin 2 Receptor Blockers***

These also are medications that treat high blood pressure and include losartan, valsartan, irbesartan and others. Instead of lowering angiotensin levels as do the ACE inhibitors, these drugs block the effects of angiotensin in the body. They appear to have similar actions to ACE Inhibitors. They are especially helpful for patients allergic or cannot take ACE Inhibitors. We are even combining these medications with an ACE inhibitor to lower angiotensin levels even more.

4 Supplements for Patients with Diabetes

(a) *Chromium* (niacin-bound or polynicotinate) 200-400 mcg twice daily

(If you have normal kidney function)

Chromium deficiency worsens insulin resistance and hyperglycemia. Most of us are deficient in chromium because the soil in which our food is grown has been depleted of chromium. The most effective dose of chromium in the studies of patients with diabetes was 500mcg twice daily.

(b) *Alpha Lipoic Acid* 250-300mg twice daily

This supplement increases insulin sensitivity by 27% in patients with Type-2 diabetes mellitus.[92] It improves symptom of nerve damage in patients with Type 2 diabetes.[93] It also decreases oxidative stress even in diabetic patients with poor blood sugar control.[94]

(c) *Magnesium citrate or gluconate* 250 to 500mg 1-2 times daily

Magnesium depletion worsens insulin resistance. Magnesium supplementation supports Vitamin E recycling of glutathione (an important antioxidant)[95] which reduces markers of oxidative stress and aging.

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[92] Jacob S et al, Free Radic Biol Med 1999 Aug;27(3-4):309-14 Oral administration of RAC-alpha-lipoic acid modulates insulin sensitivity in patients with type-2 diabetes mellitus: a placebo-controlled pilot trial.

[93] Ruhnau KJ et al, Diabet Med 1999 Dec;16(12):1040-3 Effects of 3-week oral treatment with the antioxidant thioctic acid (alpha-lipoic acid) in symptomatic diabetic polyneuropathy. These preliminary findings indicate that oral treatment with 600 mg of TA t.i.d. for 3 weeks may improve symptoms and deficits resulting from polyneuropathy in Type 2 diabetic patients, without causing significant adverse reactions.

[94] Borcea V et al, Free Radic Biol Med 1999 Jun;26(11-12):1495-500 alpha-lipoic acid decreases oxidative stress even in diabetic patients with poor glycemic control and albuminuria. Treatment with 600mg of alpha-Lipoic acid improves significantly the imbalance between increased oxidative stress and depleted antioxidant defense even in patients with poor glycemic control and albuminuria.

[95] Barbagallo M, Dominguez LJ, Tagliamonte MR, Resnick LM, Paolisso G. Hypertension 1999 Oct;34(4 Pt 2):1002-6 Effects of vitamin E and glutathione on glucose metabolism: role of magnesium. Vitamin E is an antioxidant that has been demonstrated to improve insulin action. Glutathione, another natural antioxidant, may also be important in blood pressure and glucose homeostasis, consistent with the involvement of free radicals in both essential hypertension and diabetes mellitus. These data show a clinical link between vitamin E administration, cellular magnesium, GSH/GSSG ratio, and tissue glucose metabolism.

(d) *Coenzyme Q-10* 75-100mg 2-3 times daily

Has been shown to protect the DNA in our mitochondria (the powerhouse of the cell). Damage to our mitochondria can lead to the development of Type 2 diabetes and Alzheimer's disease.[96] CoQ-10 is also helpful in reducing the damage of small vessel disease in our heart and brain, which thereby reduces heart failure and the incredible shrinking brain.

(e) *Biotin* 3 mg 2-3 times daily

Pyruvate carboxylase, a biotin-dependent enzyme, plays a crucial role in keeping our blood sugars and cholesterol normal, as well as helping the pancreas release insulin. Biotin improves the metabolism of glucose in patients with Type 2 diabetes.[97] Biotin also helps chromium in improving glucose levels.[98]

(f) *Ethanol* (alcohol) 1-2 low-sugar drinks daily (optional)

Moderate ethanol consumption reduces the inflammatory response promoting blood clotting and vessel wall damage leading to heart disease and strokes.[99] Regular alcohol consumption has an insulin-sensitizing effect on skeletal muscle that reduces insulin levels. Women who drink alcohol regularly and moderately eat more but weigh less than women who do not drink.[100]

People who do not drink alcohol should not start, but people who already drink moderately should not be discouraged from alcohol (women- 9 or less drinks/week, men- 14 or less drinks/week).

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[96] Ito K et al, Surg Today 1999;29(10):1053-8. Regulation of methionine adenosyltransferase activity by the glutathione level in rat liver during ischemia reperfusion

[97] Furukawa Y Nippon Rinsho 1999 Oct;57(10):2261-9 [Enhancement of glucose-induced insulin secretion and modification of glucose metabolism by biotin].

[98] McCarty MF Med Hypotheses 1999 May;52(5):401-6 High-dose biotin, an inducer of glucokinase expression, may synergize with chromium picolinate to enable a definitive nutritional therapy for type 2 diabetes.

[99] McCarty MF Med Hypotheses 1999 May;52(5):465-77 Interleukin-6 as a central mediator of cardiovascular risk associated with chronic inflammation, smoking, diabetes, and visceral obesity: down-regulation with essential fatty acids, ethanol and pentoxifylline.

[100] McCarty MF Med Hypotheses 2000 May;54(5):794-7 The insulin-sensitizing activity of moderate alcohol consumption may promote leanness in women.

5 Understanding the Complications of Diabetes

(a) *Sorbitol*

Excess sugar metabolized into sorbitol (a non-digestible sugar) inside cells causes cell damage and eventual cell death. This process damages nerve cells and other cells. Examples include painful or numb feet, a stiff stomach that is very slow in emptying resulting in nausea and vomiting, a bladder that does not work, and unstable blood pressure that drops when you stand up making you dizzy.

(b) *Over-filtration through the Kidney*

Excess sugar in the urine causes the kidneys to work too hard. The kidneys become scarred and spill protein. This is what causes kidney failure in patients with diabetes.

(c) ***Advanced Glycation End-products*** (AGE's cause aging)

Excess sugar acts as molecular glue causing tissues to become stiff and yellow. Advanced glycation end products (AGE's) build up in all tissues at a rapid rate in patients with poorly controlled diabetes. This results in a stiff heart that cannot pump blood very well; stiff blood vessels raising blood pressure and making you more prone to heart attacks and strokes; and causes rapid aging throughout the body.

(d) *Proliferative Eye Disease*

Excess sugar damages the blood vessels in the eyes making the blood vessels grow wildly and then they begin to leak and damage your ability to see.

(f) *Hardening of the Arteries*

Elevated cholesterol and high blood pressure worsen atherosclerosis (hardening of the arteries) resulting in heart attack, strokes, and blocked arteries in the legs. Excess glycation (the sugar-glue) probably has a role as well.

6 What Medical Testing Should Patients with Diabetes Have?

(a) *Physical exam for patients with diabetes*

Eye exams by an eye doctor every year after the age of 45 years or thereabouts. Have your doctor do a vibration test (128Hz tuning fork) of your feet, looking for peripheral neuropathy. If you can feel the vibration for less than 5 seconds, check your B-12 level, your alcohol intake, your thyroid level, and your HbgA1C (the test for blood sugar control). If your feet are already numb, you need to see a podiatrist for foot care. Keep your blood pressure less than 125/75. You also need an examination for blockages in your carotid arteries (the doctor listens to the large blood vessels in your neck). When you get into your fiftieth birthday, make sure you have the screenings recommended for common cancers (mammograms for breast cancer and sigmoidoscopy or colonoscopy for colon cancer). You may want to consider a screening ultrasound of the arteries in your neck to make sure you are not developing blockages. One company that offers this for $45.00 is www.lifelinescreening.com.

(b) *Laboratory testing for patients with diabetes*

(1) Hemoglobin A1C every 3-6 months (checks the long-term sugar control).

(2) Cholesterol, LDL (should be less than 100mg%), HDL (should be more than 50mg%), triglycerides (should be less than 100mg%).

(3) Lipoprotein (a), the bad part of the bad cholesterol, should be less than 20mg%. If it is higher, your LDL (the bad cholesterol) should be closer to 80mg% or less.

(4) Homocysteine, another risk factor for vascular disease, should be less than 9. This is treated with folic acid and vitamin B-6 and B-12.

(5) Iron, Iron binding, and ferritin; iron overload is associated with diabetes, liver disease and heart failure. The treatment is donating blood regularly.

(6) If you have a carotid ultrasound that shows atherosclerosis (cholesterol plaquing), that strongly suggests you have coronary artery disease and that you need to get your LDL cholesterol less than 80-100 mg%. Lifelinescreening is one company that can do the screenings. The web address is www.lifelinescreening.com.

7 Exercise and Diabetes

The greatest benefit comes from getting off that damn couch and doing anything! Be it walking, working out, playing tennis or other games, or Pilates or Yoga or Tai Chi; doing anything is better than doing nothing. You use less energy watching TV than you do sleeping! And it is harder to snack when you are doing something active. So get up and do something. Go bowling. Anything!

8 Type 1 Diabetes

(a) *What Causes Type 1 Diabetes?*

Type 1 diabetes is an autoimmune disorder. That is, the body attacks itself, probably in response to some injury or infection. In this case, the body has developed antibodies to the cells in the pancreas that produce insulin, the islet of Langerhans cells. When you lose these cells, you can no longer produce insulin and you develop Type 1 diabetes.

Can this autoimmune attack be prevented? No, probably not. There is some interesting evidence accumulating that certain foods may be associated with autoimmune disorders. For instance, in a study from Johns Hopkins University, the patients with Type 1 diabetes all had a strong immune response (high titers of antibodies) to the protein in cow's milk, while children without diabetes either had low levels or no antibodies to that protein. This may reflect a specific problem or just a stimulated immune system.

(b) *How to Stay Healthy with Type 1 Diabetes*

Keep your blood sugar as normal as possible. This includes using the insulin pump (if you can afford it, it is worth it), eating right, and getting exercise.

Should you also avoid the foods of Famine? Yes. It was recommended in the middle of the 19th Century that all patients with diabetes eat a diet very similar to the Mediterranean Hunter-Gatherer Diet presented in *The Staying Healthy Handout in Appendix 1*. Unfortunately, eating a healthy diet was felt to be impossible because those foods were just not available to the majority of people living in cities (due to the expense and lack of availability). Those foods are now readily available and recommended. Healthy oils and proteins require very little if any insulin to be metabolized.

9

HEART DISEASE

1 What causes your heart to break?

(a) *Atherosclerosis (hardening of the arteries)*

This is a build up of cholesterol plaques in blood vessels, leading to blockages, heart attacks (damage to heart muscle) and strokes (damage to brain). It is now felt that inflammation of the blood vessels leads to damage and cholesterol plaquing. Please see the Section 2 below on atherosclerosis for a full explanation.

Lesson: you only have one heart and one brain, so let's take care of them.

(b) *Viruses and Other Infections*

If you are sick with a fever ***Do Not Exercise!*** When you are sick with a flu-like illness, the virus will go to the parts of the body receiving the most blood. This is your heart and muscles when you are exercising. Certain individuals are more susceptible to this viral damage and can develop significant damage to heart muscle with the development of congestive heart failure.

Lesson: rest if you have a fever

(c) *Alcohol*

The drinking 1-3 drinks per day is associated with less heart disease and death; consuming 4-6 drinks or more can be associated with the development of a dilated enlarged heart, heart failure and death.

Lesson: too much of a good thing is bad

(d) *Iron Overload*

Hemachromatosis is the most common inherited disease, affecting 1/200 Caucasians. People with this disease over-absorb iron. Too much iron can lead to the development of heart failure, diabetes, arthritis and liver disease with cirrhosis. One of my patients, as well as his brother, had hemachromatosis. My patient drank beer and donated blood regularly (he was a volunteer fireman). His brother, on the other hand, drank red wine and did not donate blood. My patient was in good health. His brother died of cirrhosis. They had the same disease but different lifestyles and different outcomes.

Lesson: have your iron level (ferritin) checked and donate blood regularly.

Lesson: red wine may be good for you but is rich in iron and the alcohol promotes more iron absorption.

(e) *Valvular Problems*

Leaking valves or narrowed valves can both cause problems. Leaking valves need to be monitored by your doctor or cardiologist. Narrowed valves, particularly aortic stenosis or sclerosis (narrowing of the main valve) may be improved by reducing calcification of blood vessels. Possible interventions are discussed in detail in the section on atherosclerosis.

2 Atherosclerosis (Hardening of the Arteries)

There are many different risk factors for heart disease and stroke, not just cholesterol. The next two patients will illustrate this point; one is a success while the other is less of one.

(a) *Hassan M.*

Hassan was a gentleman in his mid seventies from the Middle East who complained of an unsteady gait and repeated falling. He had suffered a series of small strokes and heart attacks over the previous eighteen months. These episodes had continued despite his cardiologist placing him on a cholesterol lowering medication (a statin drug). His neurologist also started the blood thinner Coumadin to prevent the recurrent strokes that had continued despite the patient taking aspirin or Plavix (another blood thinner).

When I saw Hassan, his physical exam revealed significant unsteadiness and no vibration sense in his feet (using a 128 Hz tuning fork on his great toe). This loss of sensation meant the nerves to his feet did not work (he had a peripheral neuropathy). The possible causes of this neuropathy include diabetes, Vitamin B-12 deficiency, low thyroid function, multiple myeloma or syphilis. We checked the usual laboratory studies and found his Vitamin B-12 level was very low and his homocysteine level very high (homocysteine damages blood vessels and promotes blood clotting resulting in heart attacks and strokes). We treated him with Vitamin B-12 shots, first weekly and then every other week, and then finally monthly. His unsteadiness resolved and his

heart attacks and strokes stopped. He has had no problems over the last 4 years despite stopping his Coumadin blood thinner. His strokes and heart attacks were most likely due to his high homocysteine level that resulted from his lack of adequate Vitamin B-12.

Not only does homocysteine damage blood vessels and activate blood clotting, it also oxidizes the LDL (bad) cholesterol, making it cause more blockages in blood vessels. Vitamins B-6, B-12, and folic acid are all required for the metabolism of homocysteine. Many people over fifty years old do not absorb B-12 adequately. In addition, some people have an abnormal enzyme that does not completely metabolize homocysteine. In both of these situations, homocysteine accumulates and the patient will be at increased risk of heart attack and stroke. This is what happened to Hassan M. Occasionally I see patients who have been taking high doses of folic but who still have high homocysteine levels, heart attacks and strokes because of their difficulty absorbing Vitamin B-12 from their diet.

(b) ***Paul***

Paul is a gentleman in his late 60s who, despite living life correctly, being thin and eating almost no fat or cholesterol on his Pritikin diet, developed chest pressure on exertion. His doctors told him he had angina, but Paul said *That is impossible! I do everything right and my cholesterol is perfect!* He required a coronary bypass operation and then started on a cholesterol lowering medication to get his cholesterol even lower (they had to do something). He continued on his low fat/no fat diet. Then he came to see me. We checked his homocysteine level and it was 93! Any level over 9 increases your risk of heart disease and his was ten times that level. It turned out he could not absorb Vitamin B-12. He developed severe Vitamin B-12 deficiency, but this was hidden because he was taking folic acid (the folic acid will correct the anemia but not the other complications). We started him on B-12 shots and his homocysteine came down to normal. We thought we had his heart disease defeated. Three years later, however, his carotid ultrasound (a screening test using sound waves that looks at the arteries to your brain) showed increasing blockages, and subsequently developed angina again with a positive stress test.

Paul looked at me and said, *George, you're an idiot!* All of his numbers were ideal or better. The only problems we found were that his blood test for Chlamydia pneumoniae (an infection possibly associated with heart attacks) was positive (we treated him with antibiotics) and his homocysteine level was running around 12 (slight increased risk of heart disease). He had also been unwilling to add healthy oils to his diet and reduce his intake of starches. His diabetes test (the hemoglobin A1c) was near the upper limits of normal (he had borderline diabetes). Was the combination of the homocysteine, some infection or inflammation, and borderline sugars (with possible insulin resistance, although he was very thin) just enough to promote on-going heart disease despite an LDL of 50 on Lipitor!

We are continuing to work on Paul trying to get him to decrease his starches and increase olive oil, fish oil and nuts in his diet. We also increased the frequency of his B-12 shots (which he gives himself at home). He has been successful finally. We recently repeated the ultrasound of the

carotid and he had no progression of disease (he had finally stopped damaging his blood vessels) and his test for diabetes was now normal.

(c) *Screening for Atherosclerosis*

Paul is an example of how we can fail to predict who will develop heart disease based on blood work. There are many causes of heart disease, some of which we don't even know yet. So how can you tell if you are at risk? My patients are living in a large bucket I call the *Bucket of Unknown Risk*. What I try to do is to take the patients out of the *Bucket of Unknown Risk* and put them one of three places: the *Low-Risk Bucket*, the *Intermediate-Risk Bucket*, or the *High-Risk Bucket*.

Possible Solutions:

- We could do a cardiac catheterization on all patients to decide this, but this is too dangerous and too expensive.
- We could do stress tests on all patients, but these have limited ability to predict early heart disease. Stress tests only become positive if one or more coronary vessels are blocked more than 70%! This is not very helpful because most heart attacks occur in blood vessels that are 30-50% blocked. These less-blocked vessels are at higher risk of cholesterol plaque rupture and blood clot formation leading to a heart attack, without the patient ever having symptoms and even with a normal stress test (even with thallium scanning or echocardiography). Thicker plaques (over 70%) do not appear to rupture as frequently, leading to fewer heart attacks.
- Ultrasound Assessment of Carotid Artery for Atherosclerotic plaque: If you see cholesterol plaquing (blockages) in the carotids, this has a high correlation with cholesterol plaquing in the coronary circulation. The problem with this approach is if there is a large blockage, then the answer is easy. This patient needs aggressive treatment. If there is very little blockage, it could be missed by the ultrasound but the person is still at some risk of heart attack and stroke. There are also false negatives – people with no plaque in the carotids but who have blockages in the arteries to their heart.
- Assessment of Coronary Calcium Score: using an ultra-fast CT scanner or the new electron beam scanner to assess the amount of calcium in the coronary arteries may help us predict who is developing atherosclerosis and help us to follow if the therapy is helping to reduce progression (or perhaps even promote regression) of an individual's coronary disease.

Calcium Score	Risk of Coronary Atherosclerosis
0	Very low risk of coronary disease (>95% certainty)
1-10	Minimal coronary atherosclerosis
11-100	Mild to moderate atherosclerosis but significant disease unlikely
101-400	Possible significant atherosclerosis with coronary blockages
>400	Significant atherosclerosis with significant stenosis likely

Most of the data for the Coronary calcium scoring has been derived from studies on dead people (scan cadavers, get the score, and correlate with autopsy findings). Ongoing studies are being done following patients who have had scans to see what their risk of coronary disease is over the next 7 years. Initial results have been disappointing, in that the scans add little information beyond the risk predicted by known risk factors (cholesterol, family history, diabetes, smoking and hypertension). A zero score does not protect you as many patients with scores of zero still had a heart attack if they had several of the risk factors (especially diabetes and family history). A score between 10 and 400 did not significantly increase risk beyond that suggested by risk factors. Only a score over 400 gave a doubling of risk beyond that predicted by risk factors. The bottom line is to stop smoking and shrink your waist no matter how high or low your coronary calcium score. And do not be reassured by a zero score.

One example of how the coronary calcium scan could be helpful is as follows:

Harry is a fellow in his early 50's with a strong family history of heart disease (his father had a heart attack in his early 50's). He came to see me for consultation for lifestyle modification for cardiac risk reduction. He had taken the ultra-fast CT for coronary calcium and was given a score of 2000! Over 400 is considered bad, so his was considered terrible. So he had a stress test with thallium imaging. This was normal. His cardiologist did a cardiac catheterization anyway (he did not believe the stress test?) His cardiac catheterization showed a 70% blockage of his left anterior descending artery (the main artery to the left side of his heart). Yet he had no symptoms and a normal stress test. Remember that it takes more than 70% blockage to develop symptoms of blockage. Harry was at high risk of a cardiac complication. He is now on the Mediterranean Hunter-Gatherer diet and continues his Lipitor. We assessed him for pre-diabetes and found he had some elevated blood sugars, so he is following the low carbohydrate diet).

So Harry had just been diagnosed with coronary disease without any symptoms, yet. We are hoping to prevent his ever having a heart attack, or at least postponing it until he is 80 years old (hopefully). If you can stop atherosclerosis, the body can heal over the plaque and thereby prevent rupture and a heart attack. But you need to address all underlying causes of heart attacks, particularly insulin resistance and diabetes.

Note that Harry did not need a balloon angioplasty of his narrowed artery because he had no symptoms. Coronary Angioplasty (PTCA) does not appear to prevent death, but is used to control symptoms. In fact, in certain patients, PTCA may increase your need for emergency bypass operation because the breaking of the cholesterol plaque can make it grow even more. This is particularly true in patients with diabetes.

3 Congestive Heart Failure

Let's say you have some mild to moderate heart failure, known both as CHF (congestive heart failure) or DCM (dilated cardiomyopathy, an enlarged heart). What happens is the heart has trouble pumping enough blood to keep the body going, so the kidney and the adrenal gland tell the heart to work harder and harder to try to keep up. The heart becomes exhausted and begins to dilate. This makes the already stressed heart less effective at pumping blood. The body gets less blood and so sends more hormones and adrenaline to speed up the heart. A vicious downward cycle ensues where the heart is unable to keep up with the demands of the body and finally fails.

(a) *How Do We Help the Heart?*

We can unload the work from the heart using certain medications that slow the heart and open the blood vessels and thus allow the heart to pump against a much lower pressure. This can allow the heart to rest and sometimes recover some of its function (and shrink back towards normal). The medications that have been shown to reduce heart failure and prolong life include the following:

(1) Angiotensin converting enzyme inhibitors (ACE inhibitors) and the angiotensin receptor blockers (ARB) are some of the medicines that open the blood vessels and reduce the workload of the heart. All patients with congestive heart failure with a dilated heart who can tolerate one of these medications should be on one of these.

(2) Beta-blockers have also been shown to protect the heart from the adverse affects of adrenaline, thereby reducing abnormal heartbeats and sudden death.

(3) Aldactone also prevents arrhythmias and sudden death, possibly through positive effects on potassium and magnesium metabolism.

(4) Magnesium by itself can calm the heart and open blood vessels making the heart more stable and functional.

(5) Consumption of Omega-3 oils (salmon, herring, sardines and cod liver oil) in patients with heart failure is associated with 50% reductions in sudden death through the stabilization of the heart rhythm.

(6) Exercise: the more you do, the more you can do. Regular exercise makes your body more efficient in the use of oxygen, so you can do more with less. So walk. And consider joining a cardiac rehabilitation program for a formal program in making your body more efficient.

(7) Stress reduction: adrenaline release during stress increases heart rate and raises blood pressure, putting more strain on the heart. So relax and meditate.

(8) Avoid packaged foods and other foods high in salt. Excess salt in the diet is harder for the heart to clear, causing retention of fluid and edema. Eat the whole foods in the Mediterranean Hunter-Gatherer diet, but watch the miso, tamari sauce, soy sauce, pickles, tomato sauces, and sardines/kippers. Try to buy foods with no added salt, which are usually available. Use diuretics (fluid pills) only as needed to control swelling.

(9) Co-enzyme Q 10 may be helpful in maintaining mitochondrial function (the source of cellular energy) and keeping the heart stronger.

4 High Cholesterol

An abnormal lipid profile (Cholesterol, LDL, HDL, and triglyceride) is only one predictor of heart disease. Many patients with heart disease have normal lipid profiles and many patients with significantly abnormal lipid profiles have no evidence of heart disease. So we must look at the whole picture.

(a) *The Whole Picture*

Look closely at your family history of early heart disease (premature heart disease is defined as coronary disease developing in the 50's or earlier). This markedly increases your risk for reasons not completely understood.

Cigarette smoking is a major risk factor for heart attacks and strokes. This is probably due to the ongoing inflammation and increased oxidative stress from the pollutants and carbon monoxide in cigarette smoke. Most patients with diabetes die of heart disease (some die of infection or cancer). Obesity can lead to heart disease if you also have elevated triglycerides and low HDL levels.

Let's say your cholesterol is a little high, and your coronary calcium score is a little high and your father and mother both had coronary disease with angina in their 50's or 60's. What do you do to lower your risk?

(b) ***First, what is high cholesterol and what does it mean?***

Cholesterol is important in your body. Your brain and nerves are made of cholesterol, but too much small, dense, oxidized LDL appears to promote inflammation in blood vessels leading to heart attacks and strokes.

Cholesterol can be present in numerous forms in the body; some forms are good (HDL) and some bad (LDL, etc):

(1) Cholesterol: the measure of the total cholesterol is not very helpful (see below), but there have been some interesting studies looking at the association of total cholesterol with certain outcomes. It appears that, on average, a total cholesterol level of 160 is associated with the lowest mortality. Below that you have much less heart disease but instead die of cancer, homicide and suicide. It has also been found that people convicted of violent crimes have lower cholesterol levels than people convicted of non-violent crimes. So, if you are feeling homicidal or suicidal, reach for a Snickers bar quick!

(2) LDL cholesterol: This is the so-called bad cholesterol. A high LDL has a good correlation with heart disease (see recommended levels below). Also, LDL size predicts its ability to promote heart disease. Small dense LDL appears to cause more problems. How can you tell your LDL size? If you have high triglycerides, then your LDL will be smaller and denser (and worse for you).

(3) HDL cholesterol: this is the so-called good cholesterol. A low HDL is associated with more heart disease, and a high HDL appears to protect against heart disease. However, a high level of Lipoprotein (a) appears to offset the protection of a high HDL.

(4) Triglycerides: a high level of triglycerides is associated with the small dense LDL (bad) and an increased risk of developing diabetes (and is also a sign of poorly controlled diabetes). For many years it was debated whether a high level of triglycerides independently predicted heart disease, but because of the association of the small dense LDL and the pre-diabetic state, it is felt that we must pay more attention to lowering triglycerides. The diabetes medication metformin (Glucophage) is very helpful in reducing insulin resistance and lowering triglyceride levels.

(5) Lipoprotein (a): this blood particle is associated with premature coronary heart disease and stroke in both men and women. It appears to offset the benefit of a high HDL. This means a good ratio of LDL to HDL (less than 2) may not be associated with a lower risk if the Lipoprotein (a) is elevated. The

only medications that will lower the Lipoprotein (a) level are high doses of niacin and Bile acid resin binders. Most Lipid specialists just recommend getting the LDL level as low as possible (but at least down to 80) to offset the adverse affect of the Lipoprotein (a).

(c) ***Other blood tests we use to assess cardiac risk***

(1) Homocysteine: this is an amino acid intermediary which builds up in the blood if you are low in vitamin B-6, vitamin B-12, folic acid (folate), or the enzyme that metabolizes homocysteine. Homocysteine damages blood vessels, oxidizes LDL, and activates the clotting system, making heart attacks and strokes more likely. No increased risk is seen below a level of 9. A level of 12 (the upper limit of normal) increases your risk 2-3 fold. A level of 15 increases your risk 3-5 fold. If your homocysteine level is elevated, you need to be checked for Vitamin B-12 deficiency (Pernicious anemia) which will be masked by taking folic acid.

(2) C-Reactive Protein (CRP): this protein is associated with an increased level of inflammation in blood vessels and correlates well with significantly increased risk of recurrent heart disease in someone who already has heart disease. It does not do as well at predicting future heart disease in healthy people (there are many other causes of elevated CRP than just heart disease). But if your CRP level is elevated, you would like to get it down.

(d) ***What are the recommended levels of the above blood components***

Test	Acceptable if no heart disease or diabetes	Goal for patients with heart disease or diabetes	Ideal Hunter-Gatherer level
Cholesterol	a level of 160 was associated with the lowest total mortality		
LDL	<130	<100	<80
HDL	>45	>55	>65
Triglycerides	<150	<100	<50
Lipoprotein (a)	See above for details		
Homocysteine	<9	<9	<9
C-Reactive Protein	See above for details		

(e) ***What to do if one or more of your blood levels is not ideal (or even acceptable)***

(1) Attitude: I will love my body and take care of it.

(2) Intake: I will put good things into my body (the Mediterranean Hunter-Gatherer Diet; see Appendix 1 for a summary). I will stop smoking. I will drink a moderate amount of alcohol.

(3) Exercise: I will get off the couch and do something.

(4) Medications: if 1-2 months of the Mediterranean Hunter-Gatherer Diet and other lifestyle changes do not significantly alter your levels toward acceptable or better, consider one of the medications below:

(f) ***Medications for Lowering Cholesterol***

(1) Statins: Lipitor, Zocor, Pravachol, etc are all associated with drug-induced hepatitis and muscle damage (myopathy) but do a good job of lowering LDL levels, especially if taken in conjunction with diet and exercise. Lescol is less potent but has less hepatitis and very rare muscle damage when taken alone. There is evidence that Coenzyme Q-10 may reduce the muscle damage and reduce potential complications of heart failure and brain loss. It is recommended to take 100mg per day if you are taking one of the statin drugs.

(2) Niacin: Niaspan is a newer formulation available by prescription that has fewer side effects and is safer than some earlier forms. It will lower your LDL and triglycerides while raising your HDL. Niacin is associated with drug-induced hepatitis and may cause elevation of blood sugars and worsening of gout. Taking one aspirin with each dose reduces the flushing.

(3) Bile acid resin binders: often helpful when added to one of the above medications when you are not meeting cholesterol goals or are developing side effects with higher doses. These can be associated with the formation of gallstones and may cause stomach cramps and other intestinal problems.

(4) Fibric acid derivatives: Lopid has been shown to increase total mortality when used in patients not at high risk of coronary disease. This group of drugs is only recommended for patients with diabetes and elevated triglycerides. A better drug for those patients is probably metformin if their kidney function is normal.

Have your doctor recheck the lipids, liver enzymes and muscle enzyme tests one month after starting the statins and niacin, and every 3-6 months after, depending on whether you are meeting your goals. The key is to follow the Mediterranean Hunter-Gatherer diet. I have patients who, on the Mediterranean Hunter-Gatherer diet (see Appendix 1), drop their LDL over 100 points on the 10mg of Lipitor.

5 Hypertension

Your blood pressure is a barometer of health. If the Mercury is rising, that is bad (as opposed to a real barometer, when the following mercury implies the approaching storm). Elevated blood pressure tells us you are doing something wrong in your approach to life.

- Stress-mostly
- Foods you are eating
- Lack of exercise
- An allergic response
- (Or much less common causes of elevated blood pressure such as renal artery stenosis, Cushing's disease, hyperparathyroidism, hyperthyroidism, Conn's syndrome, etc.)

(a) *You Need to Change Your Course of Life*

Elevated levels of adrenaline will raise your blood pressure. Elevated levels of adrenaline can develop due to emotional stress. What is amazing is if you stress an animal, the animal's blood pressure will go up and then return to normal as the stress is removed. However, if you do not remove the stress for a long period of time, the blood pressure receptors reset and the blood pressure will continue to be elevated despite the withdrawal of stress. This appears to be reversible (eventually) through avoidance of stress or through meditation and lifestyle change (is stress avoidable as a person in the 21st Century?).

Another interesting study is a cross-sectional study of Italian women – comparing women living in a convent to women living in town. The older the women in town were, the higher their blood pressures. There was no such age difference in the nuns living in the convent (controlling for weight, family history, etc.). They had the same low blood pressure, no matter what their age. Conclusion: Italian men make your blood pressure go up.

(b) ***Autogenic Training***

The first thing I suggest to my patients with elevated blood pressure is to buy an Omron blood pressure cuff (the upper arm cuff but not the wrist or finger cuff). Then I suggest they lie down on the bed, check their blood pressure, and do the following meditation:

My arms and hands are heavy and warm
My legs and feet are heavy and warm
My neck and jaw are warm and relaxed

This meditation for autogenic training was designed and proven effective in the 1960's for preventing frostbite in mountain climbers who were trapped in blizzards while climbing mountains. Repeat this meditation slowly in a relaxed fashion for five to ten minutes. When they check their blood pressure again, it is almost invariably 10 to 20 points lower than when they started. I suggest they try to remember how they feel when their blood pressure is low and to try to feel that way for a larger part of the day. They may not accomplish as much but their health will be much better (and what is more important anyway?).

(c) ***Changing what you eat is important***

A large waist circumference is associated with insulin resistance and syndrome X. Syndrome X is the myriad of complications of insulin resistance including hypertension, diabetes, ischemic heart disease, and obesity. If you markedly reduce the consumption of sugar and starch and thereby increase the consumption of green leafy vegetables, this is associated with the consumption of many fewer calories and subsequent weight loss.

(d) ***Elevated levels of adrenaline can be due to allergies and asthma***

If you have symptoms of allergic rhinitis or asthma, your immune system has been stimulated by the dust, mold, mildew, and animal dander in your environment and is causing you to have trouble breathing. Your body's response to this is to release adrenaline to open your airways. This excess adrenaline raises your blood pressure. One of my patients came to me with markedly elevated blood pressure on two medications. Her doctor repeatedly accused her of not taking her medications. I told her to follow the Mediterranean Hunter-Gatherer diet. When she returned, not only had her allergies markedly improved off of dairy products and wheat products, but her blood pressure was also normal off of all medications.

If You Swim a Mile a Day
You Will Sleep Like a Baby
And Have Less Anxiety

10

COMMON MEDICAL PROBLEMS

Acne
Allergies and Asthma
Alzheimer's disease
Arthritis and Tendonitis
Autoimmune disorders
Common Cold
Chronic Fatigue Syndrome
Depression
Insomnia
Irritable Bowel and Heartburn
Low back and neck pain
Menopausal problems
Obesity and overweight
Osteoporosis
Sunlight and skin cancer

1 Acne

Acne is an inflammatory reaction in the skin from changes in sebaceous gland secretions resulting in obstruction of the glands and the growth of bacteria. Bacteria then release enzymes and mediators of inflammation and produce acne lesions. You need to keep secretions thin and flowing to prevent the blocking of pores and infection.

(a) *The Initiators of Acne*

Acne has been called skin diabetes, defined as local insulin resistance promoting thickening of secretions and acne. This is worsened by a high sugar diet and inhibited by a high protein diet.[101] This may explain why chocolate is often accused of causing acne. It may not be the chocolate but the associated sugar and hydrogenated vegetable oils used in the chocolate bars. Trans-fatty acids from hydrogenated vegetable oils and deep fat frying also promote changes in sebaceous gland secretions and acne.

Medications including male steroid hormones (testosterone and DHEA-S), corticosteroids such as Prednisone, birth control pills (some are worse than others), iodine and certain anti-seizure medications. Growth and sex hormones present in non-organic dairy, poultry and meat products promote increased male hormone effect and acne.[102]

Acne is often worse during periods of stress, perhaps again due to excess adrenaline leading in increased insulin resistance (or perhaps due to dietary indiscretions of sugar, dairy or candy with hydrogenated oils). Occlusive oil-based makeup can block pores and promote acne. Low thyroid function has been shown to initiate or worsen acne.[103]

(b) *The Prevention of Acne*

Avoid sugars and starches (follow the Mediterranean Hunter-Gatherer Diet or some modification thereof). Avoid the trans-fatty acids by not eating fried food or packaged food with hydrogenated vegetable oils. Avoid hormone-containing non-organic dairy, poultry, eggs and meat products. Avoid iodized salt.

Sun exposure can prevent or improve acne. Avoid occlusive makeup. Do the Emotional Freedom Technique (in Chapter 2) to reduce stress.

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[101] Kappas A, Anderson K, Conney A, et al. Nutrition-Endocrine Interactions: Induction of reciprocal changes in the delta-5-alpha-reduction of testosterone and the cytochrome P-450 dependent oxidation of estradiol by dietary macronutrients in man. Proc Natl Acad Sci USA 1983;80:7646-9.
[102] Ayres S, Mihan R. Acne vulgaris: therapy directed at patho-physiological defects. Cutis 1981; 28:41-2.
[103] Barnes B. Thyroid therapy in dermatology. Cutis 1971;8:581-3.

(c) ***The Treatment of Acne***

(1) Supplements:

Chromium 200-400mcg per day has been shown to improve acne.[104]

MSM 3000mg in the morning or as a topical cream improves acne.

Vitamin E 200-400 IU, selenium 100-200mcg and Vitamin B-6 25-50mg have been shown to improve acne.[105]

(2) Keratolytic creams or gels

Benzoyl peroxide used topically twice daily is helpful at opening pores reducing bacterial growth in more superficial acne.

(3) Antibiotic creams or gels

Clindamycin, erythromycin, sulfonamide preparations reduce bacterial growth.

(4) Combination topical antibiotic with keratolytic creams

Benzamycin, Benzaclin, etc.

(5) Retinoid creams:

Retin-A, Differin and Avita keep pores open by causing the skin to be irritated and peel more rapidly. May be used once or twice daily but may cause significant skin irritation at higher doses.

(6) Oral antibiotics

Minocycline, doxycycline or erythromycin can be helpful in moderate to severe acne.

(7) Accutane

This is used only for severe recalcitrant nodular acne. Will cause birth defects if taken while pregnant. Can elevate cholesterol and lower white blood cells. Close monitoring is required, as is a pregnancy test and proof of birth control prior to initiating therapy.

[104] McCarthy M. High chromium yeast for acne? Med Hypoth 1984;14:307-10.
[105] Michaelson G, Edquist L. Acta Derm Venerol 1984;64:9-14

2 Allergies and Asthma

Allergies and asthma are due to a systemic inflammatory response. When your head is congested and your nose is running, your whole immune system has been turned on. Not only is your head stopped up and inflamed, the whole lining of your lungs has the same process going on. In fact, the mediators of inflammation are then absorbed from your lungs into your blood stream causing a systemic inflammatory response.

(a) *Why worry about the systemic inflammatory response underlying the allergic reaction?*

Cigarettes don't cause emphysema or lung cancer, the immune system does. Atherosclerosis (hardening of the arteries leading to heart attacks and strokes) is an inflammatory disease of the blood vessels mediated by a stimulated immune system. If your nose is running or if your asthma is acting up, your immune system is over-reacting to what could be considered normal constituents of the environment: dust, mold, mildew, pollen and animal dander.

(b) *What mediates the inflammation underlying allergies and asthma (as well as emphysema and lung cancer)?*

Leukotrienes are major mediators of chronic inflammation. Previously known as the slow reacting substances of anaphylaxis, they maintain inflammation by attracting more inflammatory cells and initiating their release of more mediators of inflammation. Leukotrienes augment histamine response, initiate airway inflammatory, and promote airway smooth-muscle growth.

Viral infections such as Respiratory Syncitial Virus (RSV) can cause a syndrome indistinguishable from asthma in both children and adults. Patients with asthmatic bronchitis may take several months to have their asthma go away after such an infection. This can be seen with almost any viral bronchitis in susceptible people.

Dairy, soy, wheat, eggs, peanuts and nuts have all been shown to promote asthma and allergic rhinitis.[106] Sulfites in wine, wine vinegar, balsamic vinegar and other foods (please read labels) significantly promote allergies and asthma.[107] Removal of these foods can result in complete resolution of symptoms and loss of susceptibility to recurrence. People are often sensitive to several foods, so all possible triggers must be eliminated simultaneously or the allergic response will continue. I have seen patients omit all suspect foods but use balsamic vinegar (which contains sulfites) and continue to have problems. It was only after switching to rice vinegar that their symptoms resolved.

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[106] Bock SA. In: Tinkelman DB, Naspitz CK, eds. Childhood Asthma: Pathophysiology and treatment. New York: Marcel Dekker; 1993;537-551.

[107] Vally H, de Klerk N, Thompson PJ. Alcoholic drinks: important triggers for asthma. J Allergy Clin Immunol. 2000;105:462-7.

Tartrazine (FDA yellow dye No. 5), which is in processed foods that are orange, yellow or red (e.g. boxed macaroni and cheese, brightly colored sodas and sports drinks, jelly beans, Chinese fortune cookies, etc.) can cause serious allergic conditions. Aspirin use is sometimes associated with nasal polyps and asthma, but most people who have this are aware of this association.

(c) ***Inflamed airways are very susceptible to irritation***

Outdoor pollution, particularly ozone, nitrogen dioxide and sulfur dioxide are direct irritants to the airways and cause constriction of airways when the airways are inflamed. Inside the house you find allergens including dust, mold, mildew, animal dander and pollens. In addition there are fumes from cleaning agents, as well as pollutants from ovens and heat-stoves.

Reflux of acid into the lower esophagus (gastro-esophageal reflux) can cause cough and worsening of asthma due to the increased autonomic nervous system stimulation. This usually improves with changes in diet and lifestyle. If not, the purple pills of Prilosec, Prevacid, Nexium, or Protonix, etc. can also improve reflux. However, I encourage patients to listen to their bodies and try to figure out what is promoting the increased sensitivity in the lower esophagus.

(d) ***Treatment is based on reducing inflammation and thereby preventing bronchospasm***

Avoid the foods that turn on the immune system, especially the sulfites and all dairy foods including any products containing casein. The Mediterranean Hunter-Gatherer Diet eliminates most offending agents (although it does contain nuts). MSM has been shown to improve symptoms of allergic rhinitis when taking 3,000mg in the morning.

If you find you need to use the albuterol inhaler regularly, then you need to be taking an inhaled corticosteroid inhaler on a daily basis to reduce some of the inflammation in your airways. Ask your doctor for this.

3 Alzheimer's Disease

(a) ***How is your mother doing?***

Your mother's health is a predictor of your health. How could that be? We inherit all of our mitochondria from our mother. Mitochondria are organelles (little organs) in our cells. They originally started as parasites but we have developed a good relationship with them. Our bodies give them nutrients and they give us energy to run our cells. One way we can tell that we are all related is by our mitochondrial DNA. There was a woman they called Eve who lived 73,000 years ago in central Africa who has mitochondrial DNA most similar to all of the peoples of the world. It

appears all people may have originated from peoples who migrated from this original area and spread across the world.

Our cells need energy; mitochondria create energy for the cell. This is chemical energy in the form of ATP (adenosine triphosphate). ATP supplies the chemical energy to build proteins, kill bacteria and viruses, move muscle, and almost anything else you can think of. It is very similar to the gasoline we put into our cars. If cells do not have adequate energy, they cannot adequately repair themselves. They will age and die.

(b) ***What causes mitochondria to stop functioning?***

Mitochondria have their own DNA. If this DNA is damaged, the mitochondria cannot create ATP. This damage is often caused by super-oxide radicals which is what our bodies use to kill bacteria and viruses. If our immune systems are over-stimulated, these super-oxide radicals build up and damage our tissues. Antioxidants can help to reduce the super-oxide radicals. The antioxidants do this by taking the hit from the super-oxide radical thereby absorbing the damaging energy and preventing oxidative stress and gene deletion in the mitochondria. The antioxidants helpful in preventing mitochondrial gene deletion and brain degeneration include Vitamin E, Alpha lipoic acid, Co-enzyme Q 10, and Vitamin C.

There are other ways to slow brain degeneration. Mental exercise is good. This includes crossword puzzles and other ways of continuing active learning. One of the best ways of stimulating the whole brain is by learning a foreign language. Nothing else stimulates as many areas of the brain as this. I have recently been studying German. Sometimes in the past when I got bored, I would pick up my old Ancient Greek texts. Talk about punishment; it is like a huge and complex puzzle.

It was thought that estrogen delayed or prevented loss of cognitive function. This may have been due to the fact that the women taking estrogen were of a higher educational level. These women would also be at lower risk of dementia due to stimulating lives and challenges. It is now felt estrogen is only indicated for symptomatic relief of acute menopausal symptoms unresponsive to other therapies. See section on menopause for details.

Ibuprofen use is associated with decreased dementia. Ibuprofen reduces inflammation and at least part of Alzheimer's disease is due to inflammation of the brain. Could this suggest that those having higher stress lives are less likely to develop dementia? Or perhaps ibuprofen use is a marker for alcohol use? There is an ongoing study looking at this issue but we will not have an answer for a while (ten years?). My recommendation is as follows: If you have a headache, take ibuprofen (not acetaminophen or aspirin).

(c) *Recommendations for People with a Strong Family History of Alzheimer's Disease*

Stay physically and mentally active. Learn a new language, be it the computer or Swahili. Do crossword puzzles.

Take ibuprofen if you have aches and pains. Ibuprofen appears to reduce the risk of developing Alzheimer's disease (but not acetaminophen or naproxen). The moderate use of alcohol (if you are going to drink) is probably ok, as it is associated with less heart disease. Excessive use of alcohol promotes further brain degeneration.

You may consider taking the following supplements: Vitamin E, alpha lipoic acid, Co-enzyme Q 10, and selenium.

4 Arthritis and Tendonitis

Arthritis can be a crippling disease, so I would like to know what causes our bodies to attack our joints? What turns on our bodies to recognize our joints as being foreign and abnormal? As is discussed in Section 5 (on page 93) on autoimmune disorders, there are infections and ingestions (the food and drink we consume) that appear to make this worse.

(a) *Potential initiators of inflammation of our joints and other connective tissue.*

Infections such as Lyme disease, Parvovirus B-19, Mycoplasma pneumoniae, Hepatitis B and Hepatitis C are all associated with immune mediated arthritis. Trauma such as a wrist fracture resulting in bone death of the navicular bone and bony destruction can lead to arthritis. This bone death can also result from chronic corticosteroid (such as prednisone for Rheumatoid arthritis or other autoimmune disorder). If you live in the Northeast United States and other areas where Lyme disease is common and you have arthritis, have your doctor check a blood test for Lyme disease. Half of the people with Lyme disease never saw the tick nor had a rash. If you have strongly positive result, a trial of an antibiotic may lead to significant improvement in arthritis symptoms.

Feeding corn meal in dog food to dogs is associated with the development of arthritis. There is a possibility of the cross-reaction of antibodies to corn proteins attacking our joints as well. The major dog food manufacturers are replacing corn meal with rice meal (another filler). But when is the last time you saw a wolf eating a bowl of rice? Our dogs are still wolves (genetically). I tell my patients that if they cannot afford to feed their dog meat, they cannot afford their dog. The same is true of cats. Please feed them meat or otherwise let them catch their meals.

One out of seven patients with Rheumatoid arthritis improve if they avoid the nightshade vegetables. Some patients with hand arthritis will also improve off corn and nightshades. Therefore it may make a difference for some people to avoid possible initiators of inflammation including

corn and the nightshade vegetables (eggplant, potatoes, tomatoes and peppers). I have seen patients who have had their arthritis improve significantly by making changes in their diet, supplements and attitude.

(b) ***Can Glucosamine be Helpful and/or Harmful?***

Glucosamine has been shown to reduce the loss of cartilage in patients with knee arthritis. The problem is glucosamine has also been shown to raise insulin resistance and worsen diabetes by binding to the insulin receptor. As you will read below, this may have adverse effects on your arthritis.

(c) ***Does Insulin Resistance and Diabetes Worsen our Joint Problems?***

We know that a frozen shoulder is common in patients with diabetes. This is where the joint capsule and rotator cuff become inflamed, stiff and painful. Glycation (sugar bonding irreversibly to proteins) promotes stiffness and inflammation of joints and is probably one of the underlying causes of this. Excess insulin may also promote the growth of scar tissue in a similar fashion to what is seen in heart disease and strokes.

One of my patients came to see me. I had been exhorting him for 3 years that he had pre-diabetes and needed to change how he ate and lived his life. He did not hear me. Then he developed a stiff shoulder in his tennis arm (he is an avid and evidently an aggressive tennis player). He went to see the orthopedic surgeon who asked him *Do you have diabetes?* This shocked my patient. Finally, someone had reached him and he came to see me finally serious about changing his life to prevent diabetes. His genetic origin is from the Indian subcontinent and he therefore is at a higher risk of developing diabetes.

(d) ***Can antibiotics be helpful?***

There is some evidence that the tetracycline and macrolide antibiotics may improve some patients with arthritis and autoimmune disorders. For more information on this, I would refer you to the work of Dr. David E. Trentham, Chief of Rheumatology at Beth Israel Hospital in Boston MA. Patients with scleroderma and other autoimmune disorders such as Rheumatoid arthritis and Dermatomyositis have improved on courses of Minocycline. An informative website is http://www.roadback.org

(e) ***What about taking MSM for arthritis?***

I saw a patient in a wheelchair who, 6 years before, had a tractor-trailer truck back over her pelvis. Her injuries required that her right hip was pinned and her left hip was disarticulated (the whole leg was removed at the hip). She had been in chronic pain. When I saw her I suggested that some patients had found MSM helpful for their arthritis pain. She said she would try it. When I saw

her one month later, she had a big smile on her face; she was now only using crutches. Her pain was gone. She was now able to do what she wanted to do.

MSM can be helpful for most patients. The most common side effects are loose stool (back down on the dose) and insomnia (take the full dose in the morning).

5 **Autoimmune Disorders** (Diseases where your body attacks itself)

As discussed above, cigarettes don't damage your lungs; your immune system does. The smokers who lived to the 90 years old smoking a pack per day are *not* the smokers with a morning cough! Neither do they get repeated lung infections. Their body somehow accepts the tars and other chemicals as being natural. In most of us, however, the immune system reacts strongly to the tars and other foreign substances in cigarette smoke. The white blood cells ingest the toxins, release enzymes that digest our lung tissues, and call even more inflammatory cells continuing the process. This inflammation causes pre-cancerous changes that in some patients becomes cancer. The British Medical Journal suggested that modifying the immune response (in part by taking selenium as a supplement) appears to have a much stronger protective effect against lung cancer than stopping smoking. This is because the harmful substances are already in the lungs even though the person has stopped smoking. The damage continues but is potentially reduced or even extinguished by the antioxidants. The bottom line is that if you smoke and have a morning cough, *stop smoking before it is too late.*

(a) ***Turning on the immune system is not always a good thing.***

The cultivation of grains allowed ancient civilizations to organize into larger communities, store and ship food to distant cities, and to survive periods of famine. These grains provided valuable calories but they were a poor nutritional substitute for the wide variety of foods consumed as a hunter-gatherer. In the 1850s, it was known that a diet rich in fresh vegetables and meat was the ideal for patients with diabetes but it was felt to be unworkable because these foods were not always available in northern cities. This is no longer true, yet we continue to live on the foods of famine. Although these foods have unlimited shelf life, they are very limited in nutritional value.

Certain structural proteins in foods such as gluten (the protein in wheat) or casein (one of the proteins in milk) damage the lining of the small intestine and can cause the leaky bowel syndrome. These proteins are also very stimulating to the immune system because of their large structure and configuration. The immune system does not like certain foreign proteins and will often react to gluten and casein as invaders and will attack as it does against viruses and bacteria. When the immune system is turned on in this fashion, it is much more prone to respond to environmental allergens, such as dust, mold, mildew, and animal dander. When some patients eliminate gluten and casein from their diet, their allergies markedly improve and their bowel function normalizes.

Altered immune system function, as discussed on page 144, is often associated with an elevated adrenaline release and may promote some of the following problems:

1. Fatigue: the chronic release of adrenaline, due to stimulation of the immune system, is one of the more common causes of fatigue. If you are suffering from fatigue, you need to look at what you are putting into your body to see if something is stimulating your immune system and promoting an elevated adrenaline level. If you can determine what this is and avoid it, my experience is you will feel much better, sleep more soundly, and awaken with much more energy. My experience was that I began waking up at 5:45 AM with the urge to go running.

2. Hypertension: as discussed above, the elevation of your adrenaline level can elevate your blood pressure as well. Calming your immune system may lower your blood pressure.

3. Anxiety: free floating anxiety without apparent cause may also be related to an immune system stimulated by an allergic response or by emotional stress. To examine the latter cause without exploring the former may be much less fruitful than assessing and treating both.

4. Attention deficit disorder: there are many investigators who are convinced that there is an association between diet and ADD. Avoid the most common foods associated with an altered immune response and also the sweet and starchy foods that are associated with greater swings in blood sugar and make our brains less focused.

5. Impaired glucose tolerance: adrenaline raises blood sugar. Part of the body's response to a low blood sugar is to release adrenaline and glucagon. It thereby makes sense that an elevated adrenaline level would be associated with a higher blood sugar response and thereby increased insulin resistance. Whatever we can do to lower our adrenaline level will probably induce greater health through many pathways.

6. Lymphoid tumors: many lymphoid tumors originate from abnormal cells in the gastrointestinal tract. Patients with celiac disease (inherited sensitivity to the wheat protein gluten) are much more prone to developing gastrointestinal lymphoma. The avoidance of gluten reduces this risk to normal.

6 The Common Cold

Are you sick? Then your body is screaming at you that you need to rest and to reduce stress! But do you listen? No, of course not! No. You go to the doctor, who tells you that you need to rest (maybe). Or more likely the doctor tell you that you need antibiotics (Not!) which serve only to worsen your health (and worsen the health of the world by selecting for drug-resistant bacteria), not improve it. Read on.

(a) *Colds and Flu*

Frequent hand washing and not sharing secretions with sick people (such as touching a doorknob and then rubbing your eyes or nose without washing your hands first) can help to prevent the spread of respiratory and stomach viruses. Do not take Echinacea because it stimulates the immune system and can worsen autoimmune disorders like Rheumatoid arthritis, Pemphigus or SLE. Garlic is mild stimulator of the immune system and has some activity against viruses, fungus and bacteria. Do not take regularly, but only for symptoms for up to 5-7 days.

Symptoms of viral infections leading to the common cold include low-grade fevers (influenza often has fevers to 104 degrees), head congestion, muscle aches (may be bone breaking in influenza), sinus pressure, hacking cough with white or yellow phlegm.

(b) *Treatment of the Common Cold*

(1) Head congestion: 12-hour decongestant sprays for maximum of 2-3 days (like Afrin). I suggest 2-3 sprays per nostril followed by sniffing for as long as you can stand it (2-3 minutes). Then lie back and let it drain back and open your eustachian tubes (to open or "pop" your middle ears). If you are still feeling pressure in your sinuses, repeat. If you have prescription nasal spray such as Flonase, Nasonex, Rhinocort, etc., you may also use this following the Afrin.

(2) Cough: Robitussin DM is effective. Adding codeine if still not sleeping well is reasonable.

(3) Fever and muscle aches: acetaminophen, Advil or Aleve are helpful.

(4) Sore throat: gargle with ½ tsp. of salt in 4oz of warm water as often as necessary.

(5) Herbal remedies: deodorized garlic capsules, 2 capsules twice daily for 5 days or until symptoms improve. Avoid if you have an autoimmune disorder, please.

(c) *Complications of the Common Cold*

Only one or two percent of people with colds and flu will develop bacterial bronchitis or sinusitis. Most people with bacterial bronchitis are smokers. Most people with sinusitis have poorly controlled allergies. To control your allergies is to prevent sinusitis. The best predictors of bacterial infection are maxillary tooth pain and green or bloody nasal discharge often with symptoms for more than 5 days. These are the two most important symptoms. Increased pressure in your sinuses is helpful but is not as good a predictor (often present in colds without sinusitis).

Treatment of sinusitis is directed at draining the sinuses. This consists of the use of 12-hour decongestant sprays (like Afrin) for 3 days on, 3 days off, then 3 days on. The use of antibiotics is reserved for those with the green or bloody nasal discharge and upper toothaches. The antibiotics that are effective include amoxicillin 500mg TID, or Bactrim DS BID for 14 days. If recurrent or prolonged symptoms, Augmentin 875mg BID or Ceftin 500mg BID may be required.

Most bronchitis is viral and will improve on symptomatic treatment. Nonsmokers usually do not get bacterial bronchitis unless they also have asthma. Don't smoke. Control your allergies (see *The Staying Healthy Handout* in Appendix 1). If you develop cough productive of green and/or bloody phlegm for more than 2-3 days you may be developing bacterial bronchitis or pneumonia. This is most likely to happen in cigarette smokers. Useful antibiotics include Bactrim DS BID, doxycycline or a macrolide like erythromycin or azithromycin (Z-Pak).

(d) *Asthmatic Bronchitis*

If your respiratory tract is irritated and inflamed from underlying allergies, a viral or bacterial bronchitis can lead to significant shortness of breath, a dry hacking cough, and wheezing. This may continue for 6-12 weeks or more following the infection and can require the use of several inhalers and perhaps a steroid medication like prednisone. Many people diagnosed with recurrent pneumonia actually have bronchospasm (tightening of your airways) with the asthmatic bronchitis. If there is a question, have your doctor check your peak flow (a measure of breathing capacity). Normal levels are 550 L/min for women and 650 L/min for men. If your level is down more than 20-30%, you would probably feel better using the asthma inhalers (albuterol inhaler and/or a steroid inhaler) for a few weeks or months. Remember to avoid all dairy, red wine, citrus and chocolate if you have asthmatic bronchitis.

7 Chronic Fatigue Syndrome

(a) *Our bodies are meant to be healthy.*

Perhaps someday we will understand what is happening in patients with chronic fatigue syndrome. The answer is complex, just as is the answer to what causes heart disease. There are many different underlying processes that promote or inhibit the formation of heart attacks and strokes. The same is probably true for chronic fatigue syndrome.

It is important to understand that there is no one Chronic Fatigue Syndrome. Medical researchers have taken a group of symptoms (each with no obvious underlying cause and with little or no abnormal diagnostic testing) and created a syndrome. They have done this so they can group patients with similar symptoms to include them in medical studies to see if they improve in response to various interventions. There is no diagnostic blood test or biopsy for Chronic Fatigue Syndrome. This is may be a group of patients with an inherited tendency to overreact to certain proteins present during infections or in foods that are eaten.

It is also important to understand there is a threshold effect in disease. Picture your health as an empty 8-ounce glass. Add 6 ounces of water (illness) and nothing happens. The table is still dry. This is where most of us spend our lives, feeling pretty good and not realizing that we have problems. Now take that same glass and add an additional 4 ounces of water (illness). Water is now flowing all over the table (you develop symptoms of illness). This can happen due to a viral infection in a patient with allergies, grief in an already depressed person, bankruptcy in a person going through a divorce. The scale is tipped, the glass overflows and disease is manifest.

This is clearly seen in patients with allergic rhinitis. If your nose and sinuses are blocked 60%, you will have little or no symptoms. If you add a viral upper respiratory infection that will cause 50% obstruction in the normal person, the person with allergies is completely obstructed and will probably develop a sinus or ear infection. People without allergic rhinitis rarely (if ever) get sinus or ear infections.

The only approach we can take until we better understand what is happening to patients with chronic fatigue is to try to optimize what we can (reduce the extra 40%) and hope that enough healing can occur that these patients can live productive, enjoyable lives. But first we need an attitude of healing; in this the body can change some of its adverse responses. Our bodies appear to release healing substances in response to certain stimuli (? positive emotions of love and healing) and harmful substances in response to anger, hopelessness and depression.

So first we need an attitude of healing. Healing requires a spiritual transformation first and foremost. We must choose to explore and examine all aspects of our lives to see where our approach is creating conflicts in our immune system (abnormal stimulation with autoimmune problems) or our psychological health (impacting our ability to heal).

(b) *Possible Infectious Factors for Chronic Fatigue Syndrome*

There are patients who develop an adverse response to viral or bacterial infections that causes their immune system to react adversely against the body. There are several treatable infections that promote chronic inflammation and disease. None of these have been definitely linked to chronic fatigue syndrome but can be models of how our immune system response can damage our body's health.

Lyme disease can lead to chronic arthritis, heart disease and nervous system degeneration. Even the Lyme vaccine stimulated the immune system, causing arthritis in some patients. The vaccine has been removed from the market. Mycoplasma pneumoniae (the walking pneumonia) can cause inflammatory arthritis and other autoimmune disorders. Chlamydia pneumoniae has been associated with heart attacks. Helicobactor pylori is the underlying cause of most stomach ulcers and stomach cancer. Beta-hemolytic Streptococcus (Strep throat) can lead to damaged heart valves and kidney disease. Parvovirus B-19 causes an inflammatory arthritis. Periodontal disease can also promote heart attacks. Epstein Barr virus may be associated with the development of certain lymphomas. Hepatitis C can cause inflammation of blood vessels in the brain causing brain degeneration. And the list continues to expand as we understand more diseases.

(c) *Our Diet: Garbage In- Garbage Out*

Reactions to certain proteins in foods can promote inflammation and fatigue. Avoidance of some or all of the immune-stimulating proteins may be associated with improvement in symptoms. It can take weeks to months for the immune system to calm down after eliminating the offending proteins. Complete elimination at the beginning is the key to success. After the immune system is back to normal, a little of the offending food can occasionally be consumed without turning on the immune response significantly. See the Mediterranean Hunter-Gatherer Diet in *The Staying Healthy Handout in Appendix 1* for eating options that eliminate these foods.

Some of the most common initiators are as follows:

- All grains including wheat, corn, rye, barley, hops, etc. Oats seem to be less of a problem.
- Cow's milk and nearly all dairy products including yogurt, ice cream, cheese pizza, protein drinks with casein or whey protein, etc (a little heavy cream has very little of the allergenic protein called casein).
- Nightshade vegetables: tomatoes, peppers, eggplant and potatoes.
- Peanuts.
- Tartrazine (yellow dye FDA #5).
- Sulfites in wine, vinegar, preservatives, etc.
- Any food or additive that gives you an allergic reaction or fatigue.

(d) *Attitude and relationships: are these supportive or disruptive?*

How can we make our relationships conducive to our healing? Remember healing must come from within. Do not keep looking for answers elsewhere. Your body already contains the wisdom to heal. We just have not discovered it yet. As is clear from the foregoing discussion, a holistic approach is the only one that makes sense.

- We need to create a setting in which healing can occur, including addressing diet, interpersonal relationships, and losses that may have occurred.
- Assess for allergies, infections and autoimmune problems.
- Develop a productive activity to addresses our need for meaningful work, because most of us develop a significant portion of our self-esteem from our work.
- Allowing space for us to heal sometimes requires those close to us (family, friends, and the healthcare team) to manifest tough love. This can allow someone to create an environment in which they can heal and not be held back by secondary gain. Who among us does not find it harder to return to work when we have not been working? We need to see this as giving the freedom to heal, not as the withdrawal of love.

8 Depression

Are you enjoying life? Our usual answer is *Well, yes. Some of the time; I would say that usually I am. Except maybe at work*. But if your answer is *No!* or *Are you kidding?* then you might be depressed.

(a) *What is Depression?*

An alteration of chemicals in your brain leading to the following problems:

- Depressed mood.
  (Plus at least four out of the next six symptoms)
- Lack of enjoyment in usual activities or decreased interest in sex.
- Sleep disturbance (too much or too little).
- Loss of energy with fatigue.
- Difficulties in concentration or slowed ability to think.
- Change in appetite with associated weight change (loss or gain) of 1 pound/week or 10 pounds/year.
- Excessive or inappropriate guilt.

Many people have what is called dysthymia or chronic low-grade depression.

- Symptoms listed above present for at least three months/year for more than two years.
- May include episodes of tearfulness.
- Can lead to drug or alcohol abuse as self-medication.

Other people have a Major Depressive Episode

- Often lasts 6-12 months or more.
- Usually responds well to the antidepressant medications.

If there is a history of mood swings these people could be cyclothymic (mild to moderate mood swings) or bipolar (more severe):

- A manic phase is when a person is more active than usual, requires less sleep and has racing thoughts, inflated self-esteem, increased distractibility, excessive activity which may have negative consequences (buying sprees, reckless driving, foolish business investments, etc).
- A hypomanic phase is less severe but still may lead to poor decisions.
- If there is a history of episodes of extreme energy in a person who is now depressed, antidepressant medications can cause another manic episode.

(b) ***What is the origin of the chemical imbalances in the brain leading to depression?***

As was discussed in Chapter 1, chemicals create thoughts and thoughts create chemicals. There are chemicals that help create positive thoughts (serotonin) and chemicals that create negative ones (dopamine and melatonin). Occasionally the negative chemicals begin to predominate and depression develops. When we become depressed, our bodies are telling us that there are aspects of our lives that we need to change. Because these problems often would require significant changes by our loved ones or us, we ignore the problem. But our bodies do not give up. Our bodies continue to make us more and more uncomfortable until we finally say *Uncle*. This is when we seek professional help.

But this professional does not always help us to make the changes we need. All too often the professional will simply prescribe a medication to rebalance the chemicals, allowing us to continue in what our bodies consider an unhealthy lifestyle. Then we may find we can not get off of the medication because we have not yet changed the sources of our conflicts.

Does this mean that we need to change jobs or get divorced every time our mood goes south? No. But we must address our response to the stresses in our lives. Are we really responding in the most positive and productive way? Or are we for some reason defeating ourselves and ending up with a bad attitude. Bad attitudes come from within. As was discussed in Chapters 1 and 2, he does not make you angry. You allow yourself to become angry in response to him. Sometimes being aggressive is the appropriate thing to do, especially if it allows you to ask for

what you want. But it is important to recognize the origin of your anger and work to make changes to improve those problems. Please see Chapter 1 for details.

(c) ***What are the options for treatment of Dysthymia and Depression?***

Good nutrition has to be the foundation of therapy. Patients with insulin resistance and diabetes frequently have depression. This depression improves as the insulin resistance improves. An ongoing study at Duke University has shown an improvement in mood in 85% of patients on a very-low-carbohydrate diet. Try the Mediterranean Hunter-Gatherer Diet presented in *The Staying Healthy Handout in Appendix 1*.

Chromium polynicoinate 400-600mcg per day has been shown to be effective in dysthymia and has a helpful effect when added to Zoloft (an SSRI antidepressant medication similar to Prozac). SAMe and MSM are two other supplements that appear to help improve mood. The MSM is the precursor for SAMe and is much less expensive. The dose used in studies on allergies and knee arthritis was MSM 3,000mg in the morning along with the chromium. Do not take at night as you may develop sleep disturbance due to increased energy.

Psychotherapy is helpful in sorting out important issues and addressing misunderstandings of self and others. Dredging up the old stuff over and over may prevent some people from healing. But it is important to acknowledge your wounds, forgive yourself, and accept yourself as the whole person that you are.

Prescription antidepressant medications are very helpful and work best in conjunction with psychotherapy. They can help relieve the symptoms of depression although they often have significant adverse effects. These can include delayed sexual orgasm, a worsening of irritable bowel syndrome (most of the Prozac-like medications or SSRI's), increased anxiety (Wellbutrin), weight gain, fatigue and constipation (Tricyclic antidepressants).

(d) ***The Best Approach***

- Change your diet to reduce or eliminate starches and simple sugars while increasing the healthy oils.
- Begin the chromium supplement and MSM.
- Seek help from a psychotherapist for evaluation, diagnosis and suggestions for interventions and direction.
- Only begin a prescription medication if you have moderate to severe depression or if you have mild depression that is not improving with the other interventions.

9 Insomnia

Sleep disturbance is a frequent problem. Stressful situations and depression can worsen sleep disorders. The following recommendations are meant to improve sleep hygiene and help you to sleep through the night.

- Keep your bedroom for only two purposes: sleep and sex. Do not have a desk for work or paying bills to distract you from the important task of renewing your body for the next day. Get rid of the TV as well.
- Do not exercise in the late evening, as this will stimulate you. This does not, however, include sex with your significant other.
- Daily exercise is key. If you swim a mile a day, you will sleep like a baby.
- Practice meditation or the Emotional Freedom Technique in bed. See Chapter 2 for details
- Keep your bedroom as dark as you can.
- If there is noise from outside of your room, consider having a fan or other background noise that masks the other noises.
- As much as you can, go to sleep with the sun and get up with the sun. Winter is looking a little better with this rule.
- Certain drugs including cold remedies, alcohol and caffeine may interfere with normal sleep cycles. If you are having a problem sleeping, you might try eliminating these substances in the 3-4 hours prior to retiring.

10 Irritable Bowel Syndrome and Gastro-esophageal Reflux (Heartburn)

Irritable Bowel Syndrome (IBS) includes all of the following:

- Spastic colon
- Heartburn and Gastro-esophageal reflux disease (GERD)
- Trouble swallowing
- A lump in your throat
- Ulcer-like stomach pain

We also call this the functional bowel syndrome, which means the esophagus, stomach and intestine look normal but do not behave normally. This is seen in patients with a spastic colon. If you take a so-called normal person (i.e. a person who gets neck pain or headaches due to stress) and put a tube with a balloon tip into their lower intestine and inflate the balloon, this normal person will feel like they need to move their bowels. If you do the same procedure to a patient with spastic colon, they will develop spasm of their sigmoid colon with cramping and pain. It is clear that the same stimulus leads to a different result. Yet the sigmoid colon otherwise appears completely normal.

This same process occurs in many patients with heartburn. The gastroenterologists (stomach doctors) know that if a patient with heartburn and reflux has a normal esophagus during upper endoscopy (where they look at your esophagus and stomach using a flexible endoscope – a tube with a light on the end), that patient will never develop damage to the lower esophagus. They will never need another upper endoscopy. What these patients appear to have is an overly sensitive lower esophagus. Some acid getting into the lower esophagus is normal. What needs to be addressed in patients with heartburn with a normal esophagus is not the acid in the stomach but the hypersensitivity of the esophagus (increased by stress and certain foods). It is important, however, if you have esophagitis or Barrett's esophagus (a precancerous change in the lining of the esophagus) it remains important to follow up with your gastroenterologist.

Eighty-seven percent of patients following a very-low-carbohydrate diet report having less heartburn. Listen to your heartburn; what is it telling you? Are you eating the wrong food or could it be your attitude? These symptoms can also be worsened by milk intolerance as well as wheat sensitivity.

11 Low Back and Neck Pain

When you pinch a nerve in your neck or back you develop pain, numbness and weakness in the distribution of the pinched nerve. Eventually the pain resolves and all you have left is the weakness and numbness. The ongoing pain that many people have is due to muscle spasms. These spasms are often due to splinting of the back muscles next to the spine in an attempt to stabilize the back. But the resulting muscle tension can lead to knots of painful muscles.

Tight muscles are very prone to injury. If we have anger or stress we often put that stress into tightening the muscles in our necks or lower backs. Then, when we turn or bend the wrong way, we strain one of these tight muscles and throw our backs out. The solution is to keep our backs and necks relaxed and flexible. But that requires us to reduce our aggression and stress (from the inside) which many of us find difficult or even impossible. The problem lies not in our stressful situation but in our response to that situation. See Chapters 1 and 2 on healing for several approaches to reducing our anger, resentment and bitterness. And yes, you are probably as angry as the rest of us if you look deep enough.

12 Menopausal Problems

(a) *The Origin of Wisdom*

When I find cherry red spots (those red dots on your skin that appear as you get older) or seborrheic keratoses (those fleshy stuck-on lesions that your parents had on their backs), I refer to these as wisdom spots. That is, young people don't have any of these. You have to be older and wiser to have these special skin spots. I still remember my first cherry red spot, how depressing.

But yes, they are a blessing. So it is with menopause in many parts of the world. When Mayan Indian women reach menopause, they not only are freed from further childbearing but they also join the elders and are considered wise. When these women were studied, it was found that most of them did not suffer from hot flashes, vaginal atrophy or osteoporosis.[108]

In western society we have focused on the beauty of youth. Menopause has been considered an abnormal hormonal deficiency with the complications of estrogen lack including heart disease, osteoporosis, loss of sex drive, etc. Physicians began prescribing estrogen replacement in the 1950s. When it was determined that taking estrogen alone increased endometrial cancer several fold, progesterone replacements were added.

It was only in mid-2002 that studies suggested that estrogen replacement increased the risk of breast cancer, heart disease and did not decrease total mortality.[109] Now we need an alternative approach, and one that is hopefully more holistic than just taking a pill.

While some of the symptoms of menopause are related to reduced levels of estrogen after menopause (particularly the atrophic vaginitis), many of the other symptoms can be related to the function of the hypothalamus and pituitary. The hypothalamus (the part of the base of the brain that controls the function of the pituitary) evidently requires adequate amounts of endorphins to function correctly. Endorphins are released during exercise and improve mood and alleviate discomfort. Endorphins are also released during cigarette smoking and mild allergic reactions leading to what has been called the allergy-addiction connection (*The Staying Healthy Handout in Appendix 1*). This may explain why some women, looking for a way to feel better, eat pastries or ice cream when this action is actually worsening their overall problem. Women consuming a higher oil/lower sugar-starch diet have significantly fewer problems.

(b) ***The Major Problems Encountered in Menopause***

- Hot flashes/profuse perspiration
- Sleep disturbance/insomnia
- Vaginal dryness
- Headache
- Depressed mood
- Irritability/nervousness
- Skipped heart beats
- Loss of concentration
- Joint pain

[108] Martin MC, Block JC, Sanchez SD et al. Menopause without symptoms: the endocrinology of menopause among rural Mayan Indians. Am J Obstet Gynecol 168: 1839-45, 1993
[109] ADD REFERENCE

Possible solutions:

- Exercise helps to reduce the frequency and severity of hot flashes, improves mood, slows bone loss and markedly improves the sleep disturbance.[110] The study subjects exercised 3.5 hours per week.
- Phytoestrogens can be helpful. The foods higher in phytoestrogens are flaxseed, nuts, apples, fennel, celery and parsley. Soy is also very rich in phytoestrogens but also contain substances that inhibit protein digestion and promote abnormal growth of the thyroid.
- The Mediterranean Hunter-Gatherer Diet has been helpful in my patients to stabilize many of the symptoms of menopause. A higher fat/lower starch diet has been shown to be very effective in premenopausal women with premenstrual and menstrual problems as well as polycystic ovarian syndrome.
- Black Cohosh (trade name Remifemin 1mg. 2 tablets twice daily) can help reduce the symptoms listed above.[111] Remifemin has been shown to have an inhibitory effect on breast tumors.
- Ginkgo biloba (40mg of 24% ginkgo flavonglycoside content) is helpful for the dizziness, loss of concentration and cold feet and toes.
- Vitamin E topical preparation can be helpful in atrophic vaginitis. Taken orally at 400 IU per day has also been recommended.
- MSM is helpful in the joint pains and depressive moods. Dose is 3,000mg in the morning.
- Chromium can improve mood and energy and help maintain lean body mass.

13 Overweight and Obesity

Can you be significantly overweight while eating the Mediterranean Hunter-Gatherer diet? If you eliminate all foods of civilization (Pasta, bread, potatoes and rice; hard beans; most dairy; chips, bagels, muffins, cookies, pizza, French fries, etc), can you continue to maintain your weight?

(a) *Your genetic inheritance need not define you.*

The answer is seen in the experience of American Indians and Australian aborigines. These populations are genetically engineered to survive famine (they have the thrifty gene for metabolism). Insulin resistance is their key to survival. When there is excess food, they are able to store large amounts of fat in a short period of time. These excess fat stores allow them to survive periods of famine. If they continue eating and gaining weight, they will develop type 2 diabetes. But if they avoid the foods of famine (high starch/sugar food), their diabetes goes away and they

[110] Slavin L, Lee C. Mood and symptom reporting among middle-aged women: the relationship between menopausal status, hormone replacement therapy and exercise participation. Health Psychol 16:203-6, 1997
[111] Warnecke G. Influencing menopausal symptoms with a phytotherapeutic agent. Med Welt 36:871-4, 1985

will lose the excess weight. This is also seen in the peoples of the Indian sub-continent. But give these populations excess calories of sugar and starch and there will be an explosion of weight gain, diabetes and obesity.

(b) ***Why is it difficult to change to the Mediterranean Hunter-Gatherer diet?***

Many of the foods of civilization or foods of famine have become our comfort foods. We all grew up eating cereal, toast with jelly, peas and carrots, mashed potatoes, macaroni and cheese, French fries, fancy breads and cakes, Moon Pies, and ice cream sundaes. I will always remember sneaking off to the store with my Grandpa to buy a box of Moon Pies. That was a very special treat with an otherwise strict man (I think he secretly liked Moon Pies). Most of my life I ate a bowl or two of cereal (usually Raisin Bran because it was high in fiber) to comfort me before bedtime. Or how about sharing a bag of potato chips with Uncle Tim as he sat there smoking a Lucky Strike or two. Memories, but how did we go so wrong?

Now I have brainwashed myself into finding comfort in a bowl of steamed greens with soy sauce, olive oil and cashew butter (and maybe a dash of curry powder). And I eat them visualizing good health and the healing of my body (kale, collards and other greens are rich in lutein which reduces your risk of macular degeneration, and vitamin K which reduces heart disease and bone loss). I find comfort in these foods, but it took a while to get there. Part of what inspires me is the illness I see in others that might have been prevented by changing how they eat.

I spend most days with people who do not feel well. We share our failures and successes in our search for health and happiness. People continue to tell me how they feel much better on the Mediterranean Hunter-Gatherer diet. They say the MSM has helped their knees or their shoulder or their acne.

(c) ***Is this the placebo effect?***

If you feel like you are going to get better, are you more likely to? The answer is yes. Each of us needs to figure out how to make our life and bodies work the best.

- We need to set a goal, such as feeling good or a good waist size.
- We need to develop a positive image of ourselves.
- We need to practice forgiveness of others and ourselves.
- We need to eat well; follow the Mediterranean Hunter-Gatherer diet.
- We need to stop looking for love in all of the wrong places: i.e. in food (except maybe minimally-sweetened chocolate).

(d) ***How do we move away from compulsive eating?***

We talk about chocolate as the sex surrogate. There is something about chocolate that fills a deep-seated need. If you find yourself craving chocolate, watch out. Don't fight it, have sex. Or

reach for some unsweetened pure chocolate (it has a bite; it will meet the need). If the unsweetened chocolate is too much of a reach for you now, try the 73% or 77% pure chocolate. That is a good place to start on your road to health. But avoid the starches or you may develop heartburn eating chocolate.

Now we have met the basic desire for chocolate/sex. Chocolate consumption lowers your risk of heart disease; sex probably does as well but I have not seen any studies.

But don't try to give up eating; you will never succeed. One Lenten season I was thinking about giving up my Miller Lite. But then I thought I would never make it. So I decided to re-reconcile myself to my wife on a daily basis, meaning that I would try to always be nice, and when I wasn't, I would immediately apologize (I did not tell her I was trying to do this). Well, at first it did not go well at all. Early the first morning, my wife hit me in the back of my head and said *You're ignoring me!* I retorted *You're just paranoid.* Then I apologized and hugged her. She is not paranoid; I am a pig. But then I started to get the hang of it. By Sunday I think she was actually beginning to like me. And I noticed I wasn't drinking much beer either. My stress level was much lower. So I was succeeding in drinking less not by drinking less, but by taking on something else.

Much of our compulsive behavior originates in our psychic masochistic tendency to punish ourselves for not being good enough. But, in fact, we are all totally acceptable just as we are. Remember back to Chapters 1 and 2 on Healing; I fully and completely accept you and myself (as we are right now). But who are we and what do we want to do next? Just say to yourself *I am totally me and you will have to love me for who I am, with all of my foibles*. I am authentic and will continue to be me and you can trust that. The next section on cheating only works if you have accepted yourself for who you truly are and want to be (not what they say you should be or what Wall Street or Fifth Avenue says you should be). Cheating is for you and you only. Listen to your body and what you can do. And now, the ways I cheat (and often).

(e) ***Learning how to cheat and get away with it (on your diet).***

- Nuts always satisfy hunger because of their high good fat content (mono-unsaturated like olive oil).
- Low sugar chocolate (I try to eat unsweetened chocolate, but you can try the 73% variety).
- Low calorie alcohol (light beer, wine, or distilled liquors if served with a low calorie mixer). Maximum of 9 drinks/week for women, 14 drinks/week for men.
- Decaffeinated brewed coffee (or real coffee if you must).
- Vegetables with high fat dip (guacamole is my favorite, full of mono-unsaturated fat).
- Strawberry smoothie with a few blended nuts and frozen blueberries.
- A tablespoon of lemon-flavored Cod liver oil stabilizes your brain and heart and reduces your hunger (not really cheating but helps you keep an even keel- steady as she goes).

But do not reach for any of the following:

- Pretzels, especially the fat-free ones.
- Chips, even the baked-not-fried ones.
- Cookies and cakes (visualize DEATH).
- Ice cream (have the smoothie instead).
- Candies (except the low sugar chocolate).
- Donuts, bagels, rice cakes will all increase your appetite and make you tired.

But we often have a confused understanding of the function of eating. Is it to meet our emotional needs? Our physical needs? Our social needs?

Eating food can be a form of sharing; sharing a meal together is communion, the creation of community. Good food is a celebration of life itself. Good food is to be shared. Is it healthy to eat alone? Is eating alone similar to the person who drinks alcohol alone? The celebration of life and sharing is missed in solitude.

Can eating be a substitute for relationships? Do we develop relationships with the food itself if other people are not present? If this is so, how do we overcome this; how do we move away from looking for solace and fullness from our favorite foods?

- First, choose good foods and eat with friends and family. And if you need to cheat because you feel your needs are not being met, pick the 73% pure chocolate- instead of sex with him/her and especially instead of cookies, cakes or ice cream.
- Remember (as my wife always reminds me), healing comes from within. Peace begins from within. Give the love you wish to receive.
- Cigarettes are not the answer; cookies are not the answer; fast cars and multiple sexual partners are not the answer (as distracting as they may be).
- Community is the answer. Share a meal with a friend and talk about something meaningful to your life. Share your hopes and dreams. It will change your life.
- Let go of what society says we must look like. Focus on the creation of community. In doing so, we will become healthier and happier as we share our life with others.

But, remember that to be successful in community we must let go of past injustices, resentment and jealousy. We can live our lives alone in bitterness. Or we can be like Mother Theresa and look outside of ourselves at others less fortunate, rich and poor, and share ourselves, our hopes and our dreams, with others.

But first, let go of your negative thoughts because they will only drive others away. Psychic masochism. Do I need people to dislike me? So why do I drive them away with my sad story? Am I still working out my family relationships? What do you think? Of course you are!

Listen to those around you. Share your dreams. Let go of what's owed us. They don't owe us anything!

Sara M came to see me. She was a nurse but she was not working. She had terrible ongoing upper back and neck pain. A psychiatric patient had pushed her down 4 years previously and she was still in ongoing lawsuits to get a settlement. She had already lost twice but her lawyer continued to pursue this. I suggested she would never heal her injury until she let go of what was owed her. She told me she could not do that. She deserved to receive a settlement and she was going to continue to fight this thing. And continue to have neck pain from the anger, resentment and bitterness of not getting what she was owed. There, but for the grace of God, go all of us. We owe ourselves health and happiness. Try to follow the suggestions in this book to see if you feel better. You owe it to yourself.

Sara M finally did this and her recovery was remarkable. I would like to think I planted the thought in her mind, but I think she figured it out herself.

14 Osteoporosis and Bone Health

Our bodies are constantly rebuilding themselves. Our bones are constantly remodeling. If we give our bodies what they need for optimal health, we will be able to live a long and healthy life. But if we cheat our bodies by not giving them the best things, we are only cheating ourselves.

(a) *What are the best things for our bones?*

- Vitamin K: from lots of green leafy vegetables with olive oil to improve absorption. Most of us are not eating enough of these.
- Vitamin D: from the sun, cod liver oil or supplements. We need to consume 800 units per day or perhaps a little more.
- Magnesium: again from green leafy vegetables or sardines. Goal is 400 to 800mg per day.
- Calcium: must be balanced with magnesium. Got milk? There is no evidence that the consumption of dairy products reduces osteoporosis. In fact, the parts of the world that consume the most dairy have the most osteoporosis and the parts of the world that consume the least dairy have the least osteoporosis. So rather than *Got milk?* it should be *Got green leafy vegetables?* or better yet *Got sardines?* A bumper sticker I saw recently read *Got evidence?* Goal is 600 to 1200mg per day.
- Weight bearing exercise: strengthens bone by increasing bone stress. Walking, running, stair stepping or the elliptical machines, try to do this at least three times per week. One thing to remember about bone remodeling is that stress fractures occur 1-2 weeks into an increased exercise regimen when the bone is the weakest. In order to build new bone, the body must absorb the

old bone first. So if you greatly increase your exercise (such as increasing from running 2 miles per day to 5 miles per day) and develop hip pain or other leg pain, you will need to stop exercising. If the pain does not go away, you may have a stress fracture and need to consult your doctor. Sometimes the only way to diagnose a stress fracture is by bone scan or MRI. The plain x-ray can frequently be completely normal.

- Weight lifting: stimulates bone growth and increased male hormones (a good thing in this case).
- Balance training: remember when you used to "tightrope walk" on the timbers at the park? That exercise was training your brain and muscles to avoid falls. There is no more important time to continue this than as we age. So get back to the park and walk the timbers (with an assistant if necessary).

(b) ***What are the things that may be stealing our bones from us?***

- Cigarette smoking.
- Excessive alcohol consumption.
- Prednisone and other steroid medications.
- Fluid pills such as furosemide (Lasix).
- Diet lacking in dark green leafy vegetables and vitamin D.
- Overactive thyroid gland.
- Overactive parathyroid gland (too much calcium released from bones).
- Anorexia/bulimia.

(c) ***How can we rebuild bone?***

If we find we have weak bone, what can we do? But first some definitions.

- Osteopenia: this diagnosis is based on having more than 75% but less than 90% of the bone density of the average 30-year-old. Fracture risk is mild to moderate.
- Osteoporosis: less than 75% of the bone density of the average 30-year-old. Fracture risk is moderate to high.

What are the therapies that can rebuild and maintain bone health and strength?

- The bisphosphonates Fosamax and Actonel: these have been shown to rebuild bone and prevent fractures. Each is now available as a once weekly tablet. The bisphosphonates should not be taken if you have trouble swallowing or other significant esophageal problems. There is also an intravenous formulation that only needs to be taken every 3 months. Recent evidence suggests these medications may make bones more brittle, so try to maximize your bone health with exercise, weight lifting and good nutrition.

- Miacalcin: a nasal spray that often promotes diarrhea and does not appear to work consistently long-term.
- Estrogens: these slow bone loss, but only while taking them. The bisphosphonates may be a better approach if bone loss is severe
- Vitamin K: has been shown to help maintain bone health in athletes and patients on steroids.
- Thiazide diuretics (although choose the potassium/magnesium sparing such as Dyazide).

15 Sunlight and Skin Cancer

Many of us grew up in a time when we used coconut oil while sunbathing to get the deepest tan. Vacations were for tanning and, if you came back white, you had somehow failed. Then the fears of skin cancer, including melanoma, began to rise. Handouts in the dermatology offices described the epidemic of skin cancer. It was stated that each sunburn increased your risk of melanoma 2-3 fold. Well, try to count up the summers and multiply that by 1-2 sunburns/summer and it appears we are all at risk. Then the incidence of new cases of melanoma also seemed to be increasing dramatically.

In response to these facts, I began suggesting that people cover up using hats, sunglasses and even long-sleeve shirts. We are also told to avoid the sun between 10am and 4pm. But wait; are we sure this is correct? Did our ancestors avoid the sun from 10am to 4pm? Did they wear sunglasses? Probably not.

(a) *Can Some Sun Exposure Reduce Skin Cancer?*

How much sun exposure does it take to generate adequate levels of vitamin D? I used to think it only took a few minutes in the noonday sun to accomplish this. There is accumulating evidence that it may take much longer and require more sun than is available in our northern climate in the winter months. Vitamin D is critical in calcium metabolism and to maintain healthy bones. Most of us do not get enough sun nor do we obtain adequate vitamin D from our diets. It probably makes sense, if you do not work outdoors, to take a multivitamin with at least 400 units of vitamin D unless you are taking a tablespoon of cod liver oil (which contains 800 units of vitamin D and all of the vitamin A you could need). The maximum recommended dose of vitamin D is 800 units per day. I also suggest spending some time in the midday sun each day if possible. Depending on your complexion, you may want to start with only 5-10 minutes of direct sun. Then each day increase the time by a few minutes until you can stay in the sun for 40-60 minutes without burning. If you find your skin is very sensitive and turns red, wait a few days and decrease the duration of sun exposure. Most of us can develop a reasonable tan without burning if we are careful and do not overdo. Do not use tanning salons.

(b) ***Protecting Your Eyes***

The other concern is sunglasses. Ultraviolet radiation exposure to our eyes promotes cataracts and macular degeneration. UV coated sunglasses can greatly reduce this exposure. The problem comes from inadequate UV coating or when the UV coating is rubbed off by the cleaning of sunglasses (like cleaning with your shirt or a tissue, which I always did). Without this UV coating, even the darkest sunglasses will allow most of the UV radiation to pass through to the eye. With the sunglasses reducing visible light, the pupil dilates to let more light in. This dilation allows more UV radiation as well. A much better plan appears to be the wearing of hats to reduce the direct exposure of our eyes to the sun. Our constricted pupils will do the rest by blocking most of the light rays and UV radiation. Exceptions to this include skiing or other winter sports where you are exposed to significant UV radiation; both direct and reflected from the snow. The same is true for boating during the summer. Make sure your snow goggles or sunglasses are 100% UV protection and clean them with low abrasion lens paper.

(c) ***Skin Cancer other than Melanoma***

Skin cancer other than melanoma will continue to occur in response to chronic sun exposure, but most of these are easily treated with liquid nitrogen or excision if caught early. If you develop a new mole or scaling area in a sun-exposed area (often the tops of the ears, nose, upper lip and cheeks) or a mole or scaling area that easily bleeds, see your doctor. One common mole not to worry about is the seborrheic keratosis. These commonly form on the face, chest and back and often have a soft warty appearance. The patient often inadvertently scratches these off. They do not bleed but do tend to grow back over and over. A seborrheic keratosis will not change to cancer.

Sunlight can also improve mood in most of us, but particularly in those people with seasonal affective disorder (SAD). Again, the sun exposure needs to be with a hat but without sunglasses unless you are sailing or skiing (and only use the 100% UV blocking lenses).

(d) ***Malignant Melanoma***

There is considerable controversy about the epidemic of melanoma. Yes, the number of superficial spreading melanoma and melanoma in situ has greatly increased in the last few years. This is in contrast, however, to the number of nodular melanomas, which has remained fairly constant. These nodular melanomas are the aggressive melanomas that spread rapidly throughout the body and can kill. So although the incidence of melanoma has greatly increased, the vast majority of this increase is in the much less fatal forms.

One reason given for this great increase in the diagnosis of the superficial melanomas is the changing threshold of pathologic diagnosis of biopsies. This changing threshold is similar to grade inflation. There is no discrete cut-off between a normal mole and a melanoma. The changes seen in biopsy are referred to as dysplastic (Greek for bad growth) changes. These run the spectrum as follows:

Mild -> Moderate ->Severe -> Melanoma in-situ -> Superficial Spreading Melanoma

We are diagnosing more biopsies as melanoma partly because the pathologists, under pressure to not miss any melanomas, have shifted the curve to the right. This means they often include patients who, in the past or at other medical centers, would have been diagnosed as moderate to severe dysplasia (precancerous changes) to having melanoma in-situ or superficial spreading melanoma. This dilemma is not present in nodular melanomas because the pathologic characteristics are much better defined. My advice to patients is to avoid getting sunburned and watch pigmented moles for suspicious changes. These include the ABCDs of melanoma (see warning signs of melanoma below). Normal moles tend to be smaller than the eraser of a pencil, round with smooth borders and of uniform color and pigmentation.

(e) ***Warning Signs of Melanoma***

Worrisome moles have the following characteristics. If you have a new mole or a changing mole with any of these changes, see your doctor:

- Asymmetry: if the mole is asymmetric in color, pigmentation or surface (bumps or dimples)
- Border: irregular borders, especially if a mole begins to grow something like Mickey Mouse ears
- Color: changes in color, areas of loss of pigment, different colors in the same mole, blue-black color
- Diameter: larger than the eraser of a pencil

What is interesting is there is some evidence that vitamin D deficiency may promote skin cancer. This would suggest that some sunlight exposure might actually prevent skin cancer. But again, do not burn.

Break a Sweat Before You Stretch!

Warm Muscles Lengthen. Cold Muscles Tear.

11

EXERCISE AND STRETCHING

1 The Activities of Daily Living

So what do we need to do to stay healthy? Did you know that people who live in two story houses have fewer heart attacks than people who live in one story houses? But is that all it takes? Going upstairs to use the bathroom and go to bed? Or upstairs and downstairs to do the laundry, etc? Or could it be just getting up off the couch and going for a walk is what you really need to do? The greatest benefit (physically) is from getting up off of the couch and walking. Most of what we do beyond that is for our psychological health by reducing stress.

Of course, people with dogs also live longer than people without dogs, probably because people with dogs go for walks no matter what the weather (plus having a significant person or pet prolongs life and reduces stress). But I am still looking for the minimalist approach to health. What do we need to do?

Look at your waist circumference. Let's say you can pinch an inch and that your waist is over 30 inches if you are a woman or 35 inches if you are a man.

(a) *The Seven Steps You Must Understand and Accomplish*

1. You decide your percent body fat is too high (your best guess, based on the above assessment no matter how big or small you might be).
2. Change your diet to the ***Mediterranean Hunter-Gatherer Diet***.
   a. 5-15% calories from non-starchy vegetables and low-sugar fruits and berries
   b. 20-30% calories from protein in fish, poultry, nuts, and/or meat
   c. 50-70% calories from healthy oils in tree-nuts, olive oil, avocados, fatty fish, etc.

3. You will develop more energy. Ninety-five percent of patients on the very-low carbohydrate diet report improved energy.
4. Try to exercise a total of 15 minutes per day (2 minute warm-up, followed by 13 minutes with heart rate between 65-80% maximum heart rate (220 minus your age is your maximum predicted heart rate, lower if you are on beta-blocker medications). This means if you are 50 years old, your maximum predicted heart rate is 170 beats per minute, so your target heart rate is 110 to 136 beats per minute. You can do this by jogging, cycling, swimming laps, climbing stairs, vigorous aerobics, Pilates, etc. Anything to get your heart rate up for 13 minutes per day (sex?).
5. This exercise helps increase your metabolic rate (a little?) and will begin to increase your muscle mass. Both will allow you to burn more calories while you are sitting around the rest of the day. But move around as much as you can, and take the stairs, for heavens sake. Exercise can also release endorphins (natural morphine-like substances in your body) making you feel better. This is what makes exercise addictive. Cigarettes release endorphins, so make your choice.
6. Since you are burning more calories but your intake is stable or maybe slightly increased, your body must begin to convert your fat stores into muscle and energy.
7. So your percent body fat goes down. Ta da!

But have I lost weight yet? Probably not! So do not look at the scale! Throw out your spandex and buy pants with belts. Follow the notches on your belt. That is the only accurate easy measure of success. If you just lose weight, you may be losing as much muscle as fat (bad!). This is what happens if you just eat less without exercising, plus your metabolic rate drops because your body thinks you are starving in a famine (or something like that), so you don't have the energy to exercise. First you must eat right so your energy and mood improves so you can exercise.

Do not starve yourself.
But get rid of sugar, starch, sweet fruit and juices! (Yes, juices!)
Only then will you have the energy and lack of low mood allowing you to exercise.

But if you can become a stronger and more active person, you will burn more calories and become one of those people who can eat more and NOT GAIN WEIGHT, only because they burn it off. Shoot for thirteen minutes per day (plus a 2 minute warm-up). Ten minutes (or even eight minutes!) if you are pressed for time. Anything to get you going and improve your attitude. You do not have to do all of the exercise at one time if you cannot, but at least do the stairs again and again throughout the day.

(b) ***Stretching and Flexibility***

To get stiff is to get old. Glycation (sugar acting as molecular glue) causes our tissues to become stiff and yellow. This glycation results from excess sugar in our diet and in our bodies. So first reduce your intake of sugar and starch. And do not be competitive about stretching. Some of us are naturally very flexible and others are not. But we can all gain flexibility through exercise with stretching or yoga (or lose flexibility by not practicing to stay limber).

The important thing about stretching is your muscles need to warm up before you stretch. This means to begin exercise at a slow easy pace until you begin to break a sweat. Now that the muscles are warm and have good blood supply, they will stretch easier with less risk of injury. Never try to stretch cold muscles because you may tear some of the muscle fibers and be worse off than when you started. An excellent book for learning stretches is entitled Stretching by Bob Anderson.[112] Or better yet, join a local yoga or Tai Chi class. You will be joining a community (good for the spirit) at the same time as becoming more limber (good for the body) and more relaxed (good for the mind).

[112] Anderson, B. Stretching. Shelter Publications. Bolinas, CA

Appendix 1

The Staying Healthy Handout

The Best Way to Stay Healthy: Stay as Far Away From Doctors as You Can

Wear your seat belt, listen to the world around you, and never drink and drive.
Find some exercise you like and do it, and thereby avoid doctors.
Have a significant person (or pet) in your life.
Wear a hat and comfortable shoes.
These paths will heal us.

Promises I make to myself
I am healing.
I put good things into my body.
I have money to give away.
I have love to give away.
I try to live every minute of every day.

The Meaning of Illness.

Our symptoms and diseases are our bodies telling us something is out of whack. Sometimes it is a subtle message like tightness in our neck and shoulders or aching in a joint. Other times it is the warning shot across the bow when we develop depression, diabetes, heart disease or cancer. This warning indicates that a major life change is mandatory. If we listen to our bodies, we will hear what is off and be able to address it. Often the problem arises from something we are putting into our body (or not putting into our body; we are what we eat). At times it may be related to our approach and attitude toward life. First, we will address what we are putting into our bodies.

You need a low insulin level to live a long, healthy and happy life.

Eating sugar and starch (pasta, bread, potatoes, rice) causes your blood sugar to rapidly increase. Your pancreas releases insulin in high levels to try to control the sugar. The **excess insulin** has these negative effects:

Increases appetite making us hungry, even though we may have just eaten.
Promotes storage of the calories we eat as fat.
Inhibits the release of fat from fat cells, making weight loss much more difficult.
Promotes the development of Diabetes Type 2 by increasing insulin resistance.
Makes you crash 1-3 hours after eating with fatigue, lethargy, decreased ability to think.
Damages blood vessels and thereby increases heart attacks and strokes.
Promotes the growth of all cancer cells.
Promotes depression by causing low brain glucose and low serotonin levels.
Speeds up the cellular clock and causes premature cell death (apoptosis or programmed cell death).

The High Sugar and Starch Diet We are Eating Promotes a Higher Insulin Level.

Starch (pasta, bread, potatoes, and rice) is rapidly converted to sugar. Starch turning to sugar causes higher insulin levels. Higher insulin levels promote increased appetite, fat storage, disease and early death. Some authors (I among them) believe the epidemic of heart disease, diabetes, cancer and depression stems in a large part from the amount of sugar, corn syrup (in soft drinks, etc.), and simple starches (in breads, etc.) we consume.

Excess sugar acts as molecular glue.

Sugar in our circulation acts as an important energy source, but excess sugar acts as molecular glue, attaching itself to proteins and cross-linking them into hard yellow-brown compounds. The result of this is thickened arteries, stiff joints, feeble muscles and failing organs- the hallmarks of a frail old age. So don't wait. Avoid excess sugar now.

So it appears:

Eating sugar is death. (But a little death is OK?) **Eating starch is just like eating sugar.**

Like driving your car sixty miles per hour in first gear.
Like leaving a dozen roses in the sun with no water.
Like the slow motion version of pouring gas on your body and lighting a match.

Eating fat and cholesterol does not make your cholesterol go up as much as eating sugar does.

Insulin stimulates the liver production of triglycerides and cholesterol. Insulin promotes the storage of fat in the lower stomach that supports a higher serum cholesterol level. If your insulin level is low, the more cholesterol you eat, the less cholesterol your liver makes, and vice versa. But if your insulin level is high, watch out. Your liver will continue to pour out cholesterol in addition to the cholesterol you eat. So get your insulin level down.

The American Heart Association Prudent Diet (the Food Pyramid diet)

The AHA Prudent diet was associated with more than twice the cardiac death and twice the cancer compared to the Mediterranean diet. This is from the Lyon Trial which was a randomized controlled trial in France completed in 1998. Summary: avoid the American Heart Association diet if you want to stay healthy.

The Mediterranean diet is good but do not eat it.

Why? Because you don't work in the fields all day or ride your bike everywhere and you have money and access to better foods. People without much money must survive on foods that are inexpensive and accessible. Hence the dependence on pasta, breads, potatoes and milk products. Whereas these foods were the main foods available 100 years ago without the benefit of refrigeration or the trucking industry, now most of us have access to the best foods. So what are the best foods?

The Hunter-Gatherer Diet:

I read Neanderthin by Ray Audette, about the Paleolithic diet. It does make a lot of sense to eat what our genetic ancestors ate. Audette's book is full of very interesting material, but it seems he would choose to live in northern wintry climate where hunting was the major source of food. Eating predominately meat, fat, and nuts you will lose weight. What makes sense is to eat the Mediterranean diet minus the products of civilization (grains, beans, and milk products). And watch out for excess saturated fat.

Avoid Saturated Fat:

Dr. Swank wrote a rather compelling book on how saturated fat damages small vessels in our brains, nerves, blood vessels, etc. This small vessel disease promotes brain deterioration as well as accelerated aging of blood vessels and nerves. Aggregates of saturated fat absorbed into our blood stream from our diet cause micro-embolization (blockages) of small vessels throughout the body. In the brain, these blockages damage vessel walls causing leaking of harmful substances across the blood-brain barrier.

The blood-brain barrier usually protects the brain from inflammatory substances. This breakdown allows white blood cells and other substances to leak in the brain tissue resulting in inflammation and scarring (i.e.- loss of brain tissue). This damage is concentrated at the level of small vessels at the gray-white matter junction. The scars or plaques that are formed are identical to plaques seen in diseases such as Multiple Sclerosis. Nearly all US citizens have small vessel disease in their brain on MRI scanning by the age of sixty years. This small vessel disease leads to shrinking of our brains and loss of brain function.

Dr. Swank found that a diet very low in saturated fat stabilizes degenerative neurologic disorders including Multiple Sclerosis. But this can be a diet rich in the healthy oils such as the mono-unsaturated fat of olive oil and the nut oils as well as the omega-3 oils in fish oil and fatty fish.

How do we reduce the sugar and starch in our Diet?

The book I recommend to get started is The Best Way to Stay Healthy; Volume 1: The Mediterranean Hunter-Gatherer Diet by yours truly (available on www.lulu.com). This book presents Nutrition for Women, which presents a complete plan to eat well and includes the recipes and ideas for cheating and getting away with it.

Many people have tried the South Beach Diet, The Zone, Protein Power, Sugar Busters, and the Atkins' Diet. These diets do work for most of us but the evidence appears that a low-saturated fat, very-low-carbohydrate diet (the Mediterranean Hunter-Gatherer diet) may greatly improve health and well being while slowing aging and maintaining sexual function. The question is: As you age do you have less sex? Or perhaps the less sex you have, the more you age?! So go figure. Try cutting the carbohydrates and see what happens. A bit risky, but worth it. Absolutely!

The Mediterranean Hunter-Gatherer Diet

What to eat:

(If you can eat it raw, then eat it) Buy organic, range fed, no hormones or antibiotics used.

Vegetables- broccoli, cauliflower, Brussel sprouts, artichokes, celery, leeks, asparagus, endive, rhubarb, parsley, garlic and other spices, onions, tomatoes, and the greens of collard, spinach, mustard, kale, cabbage, kohlrabi and lettuce, etc. And don't forget lots of olive oil (1-2 cups per week) so you can absorb the fat-soluble vitamins like lutein (reduces eye disease) and vitamin K (reduces bone loss and heart disease).

Oil- olive oil, tree nut oils (almond, walnut), fish oils, and perhaps Canola oil (too processed?).

Meats- eggs, chicken, turkey. Organic without hormones or antibiotics. Organic beef and pork, and range-fed or wild venison, duck, buffalo, goose, rabbit, moose, elk, etc are also options.

Fish- salmon, sardines, bass, trout, squid, whitefish, and most other fish are excellent sources of protein and omega-3 oils. Shellfish including oysters, clams, mussels, lobster may be contaminated with pathogenic bacteria so choose carefully. Tuna and swordfish are higher in mercury and other toxins (so avoid the dark meat). Some fish (including Orange Roughie) are endangered and should be allowed to recover.

Nuts and seeds- almonds, walnuts, Brazil, cashews, macadamia, acorns, hickory, filberts, flax, sesame, coriander, celery, anise, caraway, cumin, dill, fennel, mustard and any others edible raw.

Fruits- cucumbers, tomatoes, avocados, olives, peppers, and any other fruit eaten fresh. Limited amounts of the following fruits if you are trying to lose inches because of their higher sugar content: apples, bananas, cherries, papaya, watermelon, cantaloupe, oranges, lemons, limes, tangerines, pears, peaches, melons, pineapple, plums.

Berries- blueberries, raspberries, blackberries, strawberries are best. Currants, grapes are higher in sugar, as are all dried fruits.

Alcohol?- non-sweetened alcoholic beverages appear to reduce blood sugar and insulin levels and reduce heart disease. Alcohol appears to be metabolized as a liquid fat, not as a sugar. But not recommended for everyone due to the ever-present risk of alcoholism. Limit to 14/week for men, 9/week for women.

The Foods of Famine

What not to eat:

These are the foods that can be stored for long periods of time and are referred to as the products of civilization. They allowed us to gather in communities and survive living in climates with a short growing season. But although they provide calories, they are very short in important nutrients that prevent illness and optimize health. So avoid them when you can. (If you can not eat it raw, then don't eat it.)

Grains- corn, wheat, barley, rye, rice, millet, and all products made from them. (Limited amounts of grains including oats or rice are probably all right, but I still try to get my calories from vegetables and healthy oils).

Beans- all varieties of hard beans, lima, wax, peas, peanuts, chocolate, soy, fava beans, and all products made from them.

Potatoes- all varieties of potatoes, yams, beets, taro, cassava, turnips, and all products made from them. (Do you remember how the green parts of potatoes and their sprouts are toxic; that toxin is present throughout in lower concentration). Yams are ok if you are not trying to lose weight.

Dairy- milk, cheese, yogurt, whey, casein, butter, and all products made with them (see section on allergies on page 7). This is true of many of the low-carb bars with milk protein added (casein)

Sugar- fructose, sucrose, maltose, dextrose, lactose, corn syrup and sweeteners, molasses, and all products made from them.

Bad oils and fat- the omega 6 oils (corn, safflower, sunflower, Crisco, soybean and vegetable oil) appear to promote cancer and should be avoided. Partially hydrogenated vegetable oils (in packaged snack foods and frozen dinners, etc.) also seem to promote cancer. Saturated fat (as above) must be limited also.

My goal for a balanced diet is as follows:

5-25% of calories permitted vegetables and fruit (less if you are trying to lose weight).

55-65% of calories from monounsaturated fat (olive oil and almonds) and omega-3 oils in fish, walnuts and flaxseed (lots of liquid, healthy fat, please).

15-25% of calories from protein with an emphasis on fatty fish (salmon, herring, sardines and mackerel) and lean meat and poultry.

Nutrition for Women (Men, eat 50% more, please)

Monday	Best	Better	Good
Breakfast	Smoked wild salmon (2 oz) (130/9/11/0/1-5/30) Eaten with a fork 2-3 Tsp. Cod liver oil (130/14/0/0/2-8/0) Green tea	2 poached eggs with (140/9/12/2-0-2/3-0/426) 2 strips organic turkey bacon (40/1/6/0/0-0/20) 2-3 Tsp. Cod liver oil (130/14/0/0/2-8/0) Decaf coffee	Hot organic Italian turkey sausage (one link-4 oz) (160/6/26/4-2-2/2-0/70) 2-3 Tsp. Cod liver oil (130/14/0/0/2-8/0) Coffee
Lunch	Salmon salad (½ cup) (288/21/21/3-2-1/4-3/62)	Tuna salad (½ cup) (205/12/22/0/3-2/37)	Chicken salad (½ cup) (206/18/31/5-2-3/4-0/70)
Snacks	30 almonds (1 oz) (180/16/7/7-4-3/4-0/0) Green tea	16 macadamia nuts (1 oz) (220/20/3/3-2-1/4-0/0) Decaf coffee	15 whole cashews (1 oz) (180/15/4/9-1-7/4-0/0) Coffee
Dinner	Filet Mignon (6 oz) with sautéed onion (338/27/48/6-2-4/3-0/130) Greens and olive oil (140/7/5/5-5-1/0-0/0)	Sautéed Flounder (8 oz) (320/13/38/6-2-4/1-2/100) Salad with 1 Tbs. Dressing (205/14/4/16-4-12/2-0/0)	Chicken stir fry (6 oz) (360/13/54/6-2-4/5-0/120) California style broccoli (175/11/9/12-6-6/3-0/0)
Dessert Or snack	Strawberry Smoothie (140/9/6/13-7-6/2-3/0)	½ cup frozen blueberries 1 Tbs. Heavy cream (88/6/1/9-4-5/0/21))	Fresh Berries with Heavy Cream and Brandy (116/5/2/15-6-9/0/15))
Calories Fat Protein CHO Fiber Net "carbs" O-6/O-3 Cholesterol	1285 calories 98 gm (882 cal- 68%) 88 gm (352 cal- 28%) 32 gm 20 gm 12 gm (48 calories- 4%) 14 gm/16 gm (1:1) 222 mg	1167 calories 79 gm (711 cal- 61%) 89 gm (356 cal- 30%) 42 gm 17 gm 25gm (100 calories-9%) 12 gm/12gm (1:1) 585 mg	1297 calories 77 gm (693 cal- 54%) 124 gm (496 cal- 38%) 47 gm 20 gm 27 gm (108 calories- 6%) 20 gm/ 8gm (2.5:1) 260 mg

Nutritional Content: Calories / Fat / Protein / Total Carb-Fiber-Net Carbs / Omega 6 - Omega 3 / Cholesterol

See The Best Way to Stay Healthy; Volume 1: The Mediterranean Hunter-Gatherer Diet for recipes.
Available from: **www.lulu.com/GeorgeSteeleMD** or your local bookstore.

Rules of Thumb for Eating:

Eating fat makes you satisfied. The hormone CCK that holds the food in your stomach (making you feel full) and tells your brain that you are satisfied is released from the first part of the small intestine in response to FAT. If you do not eat fat, you will never feel full or satisfied.

Shop the perimeter of the grocery store; if something will not rot or sprout, don't eat it.

It takes 20 minutes for CCK to be released and to get to your brain. No matter how much you eat, you will not feel satisfied for 20 minutes. Don't eat so much so quickly.

Chew each bite at least twenty times. The food needs to be in small pieces for the body to extract the nutrients.

Drink 8-12 glasses of filtered or spring water per day.

Don't eat pasta, bread, potatoes, and rice. Eat more low-sugar/starch vegetables and some fruit (a serving of fruit is ½ of a large apple, orange, etc.).

Eat some protein and good fat with every meal and snack (almonds and walnuts are an excellent choice).

The Supplements:

Much of our food is grown in depleted soil with the help of nitrogen fertilizers- more bushels per acre but nothing in it - at least not much of the nutrients we need. The following supplements can be used to hedge our bets and ensure some semblance of complete nutrition although if I could grow all of my food (in the South of France) I probably would not take supplements.

The following is the list of supplements to consider. The four I never miss are the MSM, chromium GTF, magnesium and Omega-3 oils. I do not recommend excess Vitamin A or beta-carotene (more than 10,000 units) because the studies are equivocal, some with an increase in cancer. Excess vitamin C was associated with increased calcification of the carotid arteries (increasing stroke risk). Vitamin E capsules may actually increase heart disease (two studies showed a trend toward worsening heart disease).

Multivitamin without Iron I do not take a multivitamin, but instead take the cod liver oil, chromium, magnesium, MSM and a healthy diet. If you take multivitamin, find one with good levels of B vitamins (25-50mg of B6) with less than 10,000 units of vitamin A. Men and postmenopausal women do not need iron so avoid vitamins with iron. If you take the cod liver oil, you may supplement with a B vitamin complex, but avoid the multivitamin as you will be taking excess vitamin D and A.

Cod Liver Oil supplies Omega-3 oils and is more cost-effective (much higher doses per serving) than capsule of fish oil. Omega-3 Oil reduces cardiac arrhythmias and death. This may be helpful in people with palpitations and extra heartbeats. The suggested serving is 2-3 Tsp. (1 Tsp. for each 50 pounds of weight, to a max of 1 Tbs.). This may be used in oil and vinegar dressing, but make fresh or keep refrigerated, as cod liver oil will go rancid if heated or left at room temperature. The flax and flax oil is no longer recommended due to possible increased cancer of the prostate (and possibly other cancers?).

For people with diabetes, depression or low mood, high cholesterol, or those trying to lose weight:

Chromium Complex GTF 200 to 400mcg per day (niacin-bound or polynicotinate). This nutrient is not in our food in adequate amounts. Deficiency is common. Low body chromium worsens high cholesterol and insulin resistance (causing a higher insulin level leading to increased heart attacks, strokes, and cancer. Deficiency is also related to chronic depression, which improves with supplementation.

For people with elevated blood pressure or at risk for weak bones:

Calcium/Magnesium 500mg/250mg once or twice daily. Maintains health of bones and heart. The magnesium also helps the absorption of calcium. Avoid excess Vitamin D (most of us get enough through our diet and sun exposure) and excess zinc (zinc and copper should be balanced in a ratio of 7 to 1). AIDS patients who consume more than 20mg/day have significantly increased mortality.

For people with or at risk for Alzheimer's, diabetes, heart failure or cancer:

Co-Enzyme Q-10 is an antioxidant that may reduce Alzheimer's disease and prevent/improve heart failure, Diabetes, and breast cancer. The dose for prevention is 100mg per day. The dose for treatment is 100mg three times daily (up to 400mg three times daily in Parkinson's disease). If you are taking any of the

cholesterol lowering drugs in the statin group (Lipitor, Zocor, Pravachol, etc.) you need to take Co-Q10 100mg daily to reduce muscle and heart complications.

Alpha Lipoic Acid is an antioxidant that prevents or improves nerve damage caused by Diabetes. The dose for prevention is 300mg once daily. The dose for damaged nerve in patients with diabetes is 300mg twice daily.

For people at risk for prostate, colorectal, or lung cancer:

Selenium 200mcg. Associated with 63% fewer prostate cancers, 56% fewer colorectal cancers, and 47% fewer lung cancer in average follow-up of 4 ½ years in a recent study. Deficiency related to soil depletion and/or erosion as well as food processing. Safe in doses of 100-200 mcg per day. Toxic over 800 mcg per day. People who eat a significant amount of fish may take this only 2-3 times per week. Equals 3 Brazil nuts.

For people with arthritis, tendonitis, allergies or wrinkles:

Methylsulfonylmethane (MSM) 1000mg capsules, take 3-4 capsules each morning. MSM is present in fresh fruits and vegetables (still on the plant or just picked minutes ago), but degrades in days of storage or with heating or processing. Also present in rare beef and other meat. This important sulfur donor (Not Sulfa! No relation to sulfa allergies) is important in creating healthy connective tissue (contributes to the body's production of chondroitin sulfate) and controlling inflammation of allergies, arthritis, and tendonitis. It reportedly reduces wrinkles over time (I'm still waiting) and promotes healthy nails and hair**.**

When our ancestor Eve was in equatorial Africa and she became hungry, she wouldn't run to the Acme Grocery Store or the Seven Eleven for something to eat. She would go out into her yard (she had a very big yard) and find something to eat, still living, either on a bush or tree or perhaps running along. And she would probably eat it raw. What is interesting about this is that there are nutrients that are in fresh still on the plant foods but not in the best organic foods at the organic food stores. An example of this is methylsulfonylmethane or MSM.

MSM is an important sulfur donor in metabolism and is the rate-limiting step for methionine synthesis, an important amino acid in the prevention and control of inflammation. This is the precursor for SAMe or S-adenosyl-L-methionene, the miracle cure for arthritis and depression (but is much less expensive). If you don't have enough MSM in your diet, you cannot make enough methionine, and degenerative diseases occur. These diseases include arthritis, allergies and asthma, cancer, insomnia, muscle cramps and tendonitis, and depressed mood. It is estimated that 40% of the elderly have severe sulfur deficiency, which leads to many of their problems in aging.

The Allergic Response

In my clinical practice I have found food sensitivities to be much more common than I had ever expected. Milk, peanut, and wheat allergies are causing some of the allergic rhinitis, asthma, and rashes that I see. Patients have been able to stop 2 or even 3 prescription drugs after eliminating offending items, then developing symptoms again when re-challenging themselves.

Much of our allergies and asthma are related directly to the food we eat.

When our son was five years old he developed asthma (both my wife and I had asthma as children). We cleaned the house, took out the rugs, and put in HEPA filters. He got better and then worse again. He was diagnosed with pneumonia twice and had chronic congestion and dry cough. He was using two inhalers. Nothing we did seemed to make much difference.

Then one of my patients had suggested I buy the book Optimal Wellness by Ralph Golan, M.D. My patient reported the book had informative sections on low blood sugars and food allergies. Twice I went to buy the book and twice I left without it because the information seemed so foreign. I was reluctant because if Dr. Golan was right, then I was ignorant of (and resistant to) much of the information he was presenting.

I finally bought the book. Dr. Golan wrote that at least some of asthma and allergies are on the basis of food allergies. Our son John (who was now six years old) and I went to local organic food store and bought the foods that Dr. Golan suggested we substitute for our usual diet (John and I did this together). Over the next two weeks John's cough, congestion, and wheezing went away. As we added foods back, John began coughing after eating peanut butter crackers. When we got to milk, his eyes began burning and he cried. John is now eleven years old and has put his inhalers away ever since changing his diet at age six. And this was a kid who had lived on all the foods to which he was allergic, including string cheese, yogurt, cereal with milk, ice cream, pizza, macaroni and cheese, and peanut butter crackers.

Most people have noticed that drinking milk gives them more mucus. Singers are told to avoid milk before concerts to reduce congestion. Athletes are told to avoid all milk products before sporting events to reduce secretions. What are our bodies telling us by this? Don't drink milk.

How do foods cause allergic symptoms?

It appears that large proteins absorbed through our gut stimulate our immune system and initiate much of the allergic response we see in the upper and lower respiratory tracts. The large proteins in milk and peanuts had apparently stimulated our son's immune system to react to dust, mold, and animal dander in his local environment. We could not eliminate the dust, mold, mildew, and mouse dander adequately from our old house but we could modify his diet, which in his case did the trick.

And this trick has worked over and over again in my patients. The most common offenders are milk protein (casein), wheat protein (gluten), and peanuts, as well as the sulfites in red wine and the proteins in orange juice and corn. My patients report that they have stopped all of their allergy and/or asthma medications and only need them if they cheat (i.e. Pizza and ice cream in milk-allergic, or flour-based products in wheat-allergic). One patient was a surgeon from Europe in his mid thirties with a history of asthma since childhood. He was very doubtful, but after he eliminated the most common foods that cause an allergic response (see list below), his asthma was gone. When he again tried wheat, orange juice and red wine (using the elimination and reintroduction diet), his asthma symptoms returned. Since avoiding these, his asthma has resolved and he no longer needs his inhalers (and his breathing tests are normal).

Dr. Oski, the emeritus chairman of Pediatrics at the Johns Hopkins School of Medicine, wrote a book entitled Don't Drink Your Milk. In this book he shares his clinical experience that milk, wheat, peanut, oranges, wine, etc. initiate an abnormal immune response in many individuals causing recurrent ear infections, asthma, and gastrointestinal problems. More on the elimination diet later.

Don't Drink Your Milk (if you have allergies, asthma, or head congestion)

The Dairy Council has done a wonderful job of marketing milk as an important calcium source. The Harvard Nurses Health study showed that the more milk women drank, the more fractures they had (in this study of 74,000 women, the women who drank three glasses of milk per day had more fractures than those who rarely drank milk). There are many healthier calcium sources, such as the leafy vegetables and sardines, etc. One cup of broccoli or one can of sardines provides you with more than half of the daily requirement. If you aren't going to base your major calorie intake on leafy vegetables, then I suggest one or two calcium/ magnesium supplements per day (see section on supplements).

Recently it has been shown that increased consumption of milk products by young women increases their risk of eventual breast cancer. Even the organic dairy farmers milk pregnant cows that have very high levels of progesterone in their milk (usually pregnant cows do not suckle calves). So there are ever more reasons to consider the alternative sources of calcium (dark green leafy vegetables and ?sardines).

One of the sugars in milk (galactose) has been associated with increased risk of ovarian cancer, juvenile-onset diabetes mellitus, and cataracts. I encourage my patients with allergies and those feeling less than great to eliminate milk. Eliminating wheat (wheat flour-based foods) is also healthier for many people. This consists of eating a whole food diet while eliminating all processed and packaged foods that you cannot identify the contents.

The following includes the most common foods associated with symptoms of sensitivity:

Headaches: wheat, chocolate, MSG, nuts, wine, cheese, eggs, milk, citrus fruits
Allergic rhinitis (hayfever): milk, wheat, peanuts, chocolate, sulfites in wine
Hives: strawberries, tomatoes, chocolate, eggs, shellfish, mangoes, pork, peanuts, nuts
Asthma: milk, wheat, tartrazine (FDA yellow dye #5), aspirin, peanuts, orange juice, sulfites in wine
Hyperactivity, poor attention: corn, wheat, milk, soybeans, beer (grains- hops, barley)
Eczema: eggs, citrus fruits, tomatoes

Milk Makes More Mucus (so does wine, orange juice, and chocolate)

Milk allergy and asthma is a well-known association in children. Athletes and singers are consistently told to avoid milk products before important engagements because they often increase airway congestion and secretions. So why do we encourage people to consume a substance otherwise foreign to their existence after weaning (for the USDA and the economy of course!)? Contrary to the popular belief that we outgrow our allergy to milk as we grow older, it can manifest itself in different ways in adults. These can include allergic rhinitis, chronic fatigue and chronic low-grade depression. I have seen many patients (including our son and the surgeon from Denmark) have their symptoms resolve completely following the exclusion of the offending food, most commonly milk, wheat, sulfites and peanuts.

Milk Products Are Everywhere (and take an effort to avoid)

Milk, cheese, yogurt, ice cream
Cream in your coffee (the hardest for me to give up), Lattes
Pizza
Bagel and cream cheese
Cottage cheese
Baked goods with casein or whey (the milk proteins that promote allergy)
Protein drinks with casein or whey
Any food with casein or whey listed on the ingredients
Lactaid products still have the allergenic proteins

What are the options?

Soy-milk, almond-milk, or rice-milk instead of cows milk on cereal or in coffee
Fresh or frozen berries for dessert instead of ice cream
What?! For pizza? Is there no acceptable substitute? Won't the anchovies protect me?

The Other Side of Soy (Consider almond-milk or rice-milk if you or your children like milk)

Many patients told me not to recommend soy. Science supports them. Soy contains substances that can promote abnormal thyroid growth and goiter. There are substances that interfere with protein digestion. Not to mention the acid-extraction procedures that are used to process soymilk and tofu, which oxidizes and hydrolyzes the proteins. Fermented soy products (miso) are ok, because these are not acid-extracted and the bacteria break down the harmful substances.

The Allergy-Addiction Connection

I am also learning more about the allergy-addiction connection. It appears that often the allergic response to foods causes the release of adrenaline and endorphins (morphine-like substances) that give us an energy boost and a greater sense of well being and creativity. This can be followed by a crash. If the suspected allergen is not eaten, we can get a mild withdrawal reaction making us crave the food.

The foods we crave (even if the craving is very subtle) can be the very foods making us feel less-than-great to begin with (causing fatigue and depressed mood). Food and drink associated with this reaction are listed below. You may not want to let go of your substance of abuse, but at least you will understand your body's reaction.

Foods associated with Allergy-Addiction.

Dairy products
Corn, wheat, and other grains
Chocolate, coffee and tobacco products
Alcoholic beverages, particularly beer and wine

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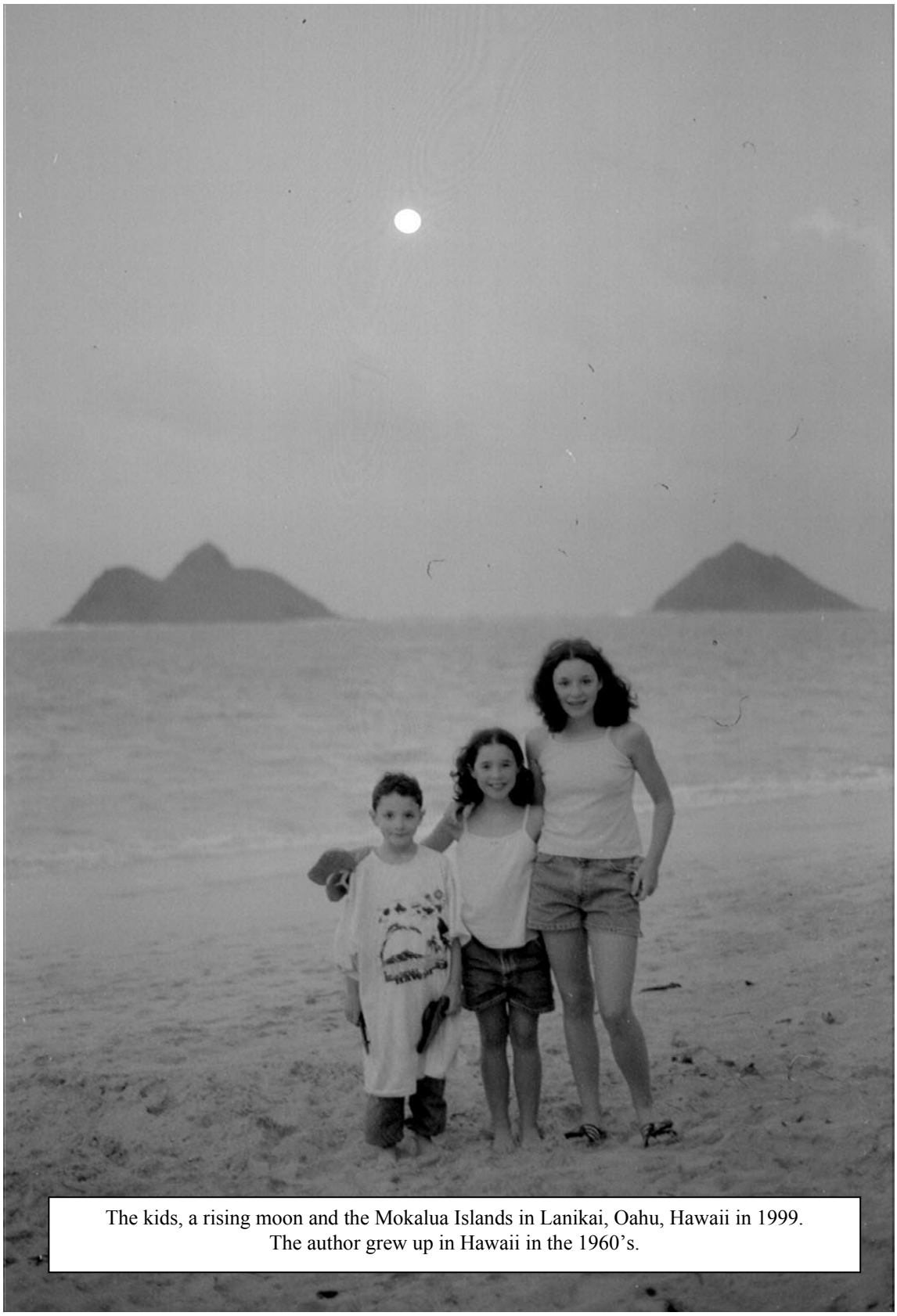

The kids, a rising moon and the Mokalua Islands in Lanikai, Oahu, Hawaii in 1999.
The author grew up in Hawaii in the 1960's.

A good doctor is better than a bad doctor

and almost as good as no doctor at all.

Anonymous